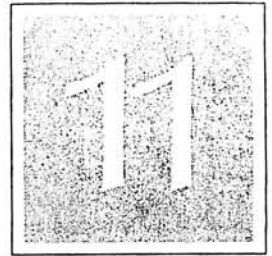Savickas, M. (1990). Work and Adjustment in D. Wedding (Ed)
<u>Behavior and Medicine</u> (pp. 149-161). St. Louis: Mosby.

RESURRECTION

He was a wheeler-dealer who had made
his pile by cutting corners, chiseling here
and there, and kicking back a bit of what
he stole. A coronary and a stroke,
two disappointing sons, a nervous wife
who nagged and ailed by turn, extravagance
and generosity, had turned him poor again
at seventy. He humbly asked his sons
to take him in, and, strange to say, they did.

And so he went to live away from home,
abandoning the house that he had built,
the flower beds that he had dug on hands
and knees, the shrubs that he had set with care
for orderly procession of both bloom
and leaf, the copper downspouts from the roof,
the cedared attic and the paneled den,
the parquet floors and antique Persian rugs. . . .

His sons, despite myriad analytic hours,
made him no happier than they had when in
their pimply, selfish teens. He missed and mourned
his home, his friends, his affluence and pride.
He soon was ill again and showed his mood,
when roused from cardiac arrest, by asking,
querulous, the nurse who thumped his chest
to start his heart again, "Why did you hit
me when I merely said, 'I'd like another
blanket, please'!" quite unaware that he
had died and resurrection had occurred.

No thump aroused him when asystole
occurred again. Now, when I pass his old
house by, and see the crabgrass in the lawn,
the rusty rhododendrons and the weeds
thick through the flower beds, I think how right
it is that resurrection is a myth
for frightened children on a scary night.

SAMUEL STEARNS

Work and Adjustment

Mark L. Savickas

About 400,000 new cases of occupational disease and work-generated illness occur each year. Of 164 family practice physicians surveyed (Campbell & Nicolle, 1981), 87% reported that they encounter occupationally related illness or injury in their practices at least once a week. These statistics notwithstanding, medical school curricula and textbooks do not adequately address either work-related illness or occupational history-taking techniques (Felton, 1980). Thus it is not surprising that when Demers and Wall (1983) inspected 624 patient reports written by 39 urban family physicians, they found that only 24% of the reports mentioned occupation or current employment status and only 2% of the reports included additional information on the patient's occupational history. Because work is fundamental to human health and adjustment, physicians can benefit from knowing about their patients' work lives.

This chapter describes what work does to and for people. The five sections into which the chapter is divided correspond to five different perspectives on work and adjustment:

1. Work as a cultural role
2. Work as a personal experience
3. Occupation as a source of social identity
4. Job as a person-environment interaction
5. Career as a sequence of job changes

A brief list of resources to help physicians understand and cope with their own work, occupation, and career appears at the end of the chapter.

WORK AND CULTURAL ADJUSTMENT

Human beings must adapt to their environment to survive and reproduce. Unlike other creatures, humans meet their biological needs with the help of a symbolic environment we call **culture**. A culture emerges when people band together to enhance each individual's chance to survive. Although not often thought of in this way, a culture is an adaptive strategy. Individuals use their culture to adapt to their physical environment. We are, according to Mayr (1964), "generalist" animals prepared to specialize or function in any number of varied cultures. We assimilate a particular culture's interpretation of life through our thoughts and feelings, and most important, through our willingness to cooperate. Anthropologists have identified cooperative culture as the key to human evolution (Rosenman, 1986).

To cooperate, individuals must first learn what the community expects from each person. Cultures differ in how they define the meaning of life and how they structure the social roles that link individuals to the community. A culture's roles, rules, and rituals channel behavior and provide criteria for judging whether these behaviors are normal or deviant. What one culture condones, another may condemn. Representatives of a particular culture must teach new members what is expected of them. Young children first learn from their families how to behave appropriately. Agents of other cultural institutions then reaffirm what families have taught and correct faulty learning

TABLE 11-1 Relationship between the functions and meanings of work	Work function	Work meaning
	Income	Maintaining a minimum sustenance level of existence
		Achieving some higher level or group standard
	Expenditure of time and energy	Something to do
		A way of filling the day or passing time
	Identification and status	Source of self-respect
		Way of achieving recognition or respect from others
		Definition of role
	Association	Friendship relations
		Peer-group relations
		Subordinate-superordinate relations
	Source of meaningful life experience	Gives purpose to life
		Creativity: self-expression
		New experience
		Service to others

From Friedmann, E. A., & Havighurst, R. J. (1954). *The meaning of work and retirement* (p. 7). Chicago: University of Chicago.

that may have occurred during the primary socialization experience. Churches, schools, theaters, and courts use the culture's collective common sense to induct children into culturally designed adult roles. These institutions welcome children into the community and try to convince them that they belong. They teach children the attitudes and skills necessary to perform social roles competently and confidently.

What, then, do we expect from one another in our culture? The simplest answer to this question seems at once the most profound. Freud (1961) wrote that work and love are the parents of our civilization. When asked what a mature person must do, Freud, according to Erikson (1968), answered, "love and work." Alfred Adler, an early twentieth-century community-minded psychiatrist, added friendship, saying that to be well adjusted, an individual must successfully deal with the challenges presented by work, friendship, and love. Some cultural scholars expand the tasks of life beyond those involved in adapting to our little crust of the earth and advise unity with the cosmos. For example, early in this century, Cabot (1914), the Harvard professor of medicine who founded the "Case Reports from Massachusetts Hospital" section of the *New England Journal of Medicine*, wrote that a well-adjusted life must be balanced among work, play, love, and worship.

Among these core roles, work has always been primary in Western culture. Work concerned our ancestors from dawn to dusk. In struggling to survive, they spent most of their time engaged in hunting and fishing and in associated rituals.

Friendship, love, and worship can be valued sources of personal support, but work is of paramount importance. Yesterday's families functioned as a unit for physical survival, not personal development. For them, even love was an economic decision. Not until late in the eighteenth century did people consider love an important part of marriage (Beigel, 1951). Until then, all but the upper class viewed marriage as a business arrangement in which partners contracted to help each other survive. Because so many children died by the age of 5, society discouraged parental bonding with young children. Even then, many parents sent their surviving 6-year-old sons to live with master craftsmen for 7-year apprenticeships. The Industrial Revolution, in moving work from the home to the factory, made work a circumscribed role separate and distinct from other life roles such as friendship, love, play, and worship.

Postindustrial societies like ours still maintain the primacy of the work role, although some observers would disagree (Kasl, 1978). Friedmann and Havighurst (1954) succinctly explicated the cultural functions of work and related these functions to the fulfillment of workers' needs. They argued that work is the only cultural role that can meet all five levels of human need: income, expenditure of time and energy, identification and status, association, and source of meaningful life experience. In discussing the five functions listed in Table 11-1, Friedmann and Havighurst (1954) concluded that work is more basic to survival and self-esteem than are friendship and love. Work challenges individuals to assume responsibility for their sustenance. It also encourages them to actively identify with and contribute to their "tribe" and thus experience a sense of belonging. Through work individuals resolve the generational crisis by changing from dependent consumers to self-sufficient producers and then to cultural stewards and caretakers of the next generation. Erikson's schema of progression from industry to identity and eventually to generativity aptly testifies to the centrality of the work role in the human life cycle. (See Chapter 2 for an overview of Erikson's model.)

During the fourth of Erikson's eight stages of life, young children must turn from their "mothers to others" as they enter elementary school. There they learn about rules and relationships in the world of work. They experience the crisis of **industry vs. inferiority** as they balance their ability to use the tools of their culture with feelings of inadequacy about their own skills as compared with those of their peers. Children who can stave off feelings of inadequacy and low self-esteem emerge from elementary school with a sense of competence, that is, a belief that they can engage in serious tasks and learn what they need to know to

complete these tasks successfully. This sense of competence sustains their later cooperative participation in adult work roles. Without a sense of competence, adults may approach work with a competitive attitude based on childlike feelings of inferiority and inadequacy.

The results of Vaillant and Vaillant's (1981) longitudinal study of inner-city men empirically underscores the importance that Erikson attributed to the achievement of a sense of competence. The Vaillants prospectively followed 456 inner-city males from age 14 to 47. Judges, who were not told the adult outcomes, rated systematic observations that were recorded when the subjects were age 14 for success at tasks reflecting the Eriksonian crisis of industry vs. inferiority. On an 8-point scale to measure competence, each boy was assigned a 0 or 1 for a regular part-time job, regular household chores, participation in extracurricular clubs or sports, and regular school participation in activities and a 0, 1, or 2 for school grades relative to IQ and for ability to make the best of the environment (planning and coping capacity). This scale assessed what the boys did, not what they said or thought. By the age of 47, men who had scored 7 or 8 on this boyhood scale, compared with men who had scored 0 to 2, were twice as likely to be rated as generative (that is, productive, caring, and concerned about the next generation), twice as likely to have warm relations with a variety of people, and 5 times more likely to be well paid for their adult work. Moreover, they were 16 times less likely to have experienced significant unemployment. Those who scored 0 to 2 were 10 times more likely to be rated as emotionally disabled and 6 times more likely to have died.

The relation of competence to death reminds us that work is the root of adjustment. Palmore (1969) illustrated this point in his report of a longitudinal (13-year) interdisciplinary study on aging. Palmore correlated 39 variables with longevity and found that the strongest predictor of longevity, after controlling for age, was work satisfaction.

When the six strongest independent variables (work satisfaction, happiness rating, physical functioning, tobacco use, performance IQ, and leisure activities) are combined in a step-wise multiple regression, work satisfaction is the best over-all predictor of LQ (i.e., longevity quotient) and explains about half of the final cumulative variance. (p. 249)

Vaillant's (1979) report of data from a longitudinal study of mental and physical health lends further credibility to the work-health connection. For 188 college graduates, job satisfaction at age 40 correlated .34 with deterioration in physical health during the succeeding 9-year period.

Beyond sustaining physical health, work fosters mental health by binding individuals to reality.

Work requires that people leave their private logic and fantasies to participate in the ironclad logic of community living. As Freud (1961, p. 80) wrote, work provides the worker with a "secure place in a portion of reality, in the human community." For many psychoanalysts, work capacity is the cardinal sign of mental health (Hendrick, 1943). Vaillant and Vaillant (1981), among others, reported that job satisfaction is closely associated with mental health. They concluded that "mastery in the workplace reflects ego strength just as much as it reflects social conformity and good luck" (p. 609). In contrast, incapacity to work is correlated with poor mental health. Unemployment is highest among the mentally ill, not the socially disadvantaged, and prior work history is one of the most powerful predictors of recovery from schizophrenia, drug addiction, delinquency, and alcoholism.

PERSONAL EXPERIENCE OF WORK

No other technique for the conduct of life attaches the individual so firmly to reality as laying emphasis on work.
SIGMUND FREUD

Cultures vary in their definitions of work. The ancient Greeks viewed work as a curse. Slaves performed this painful necessity while citizens pursued leisure. For the Hebrews the curse of work was a product of original sin and a means of atonement. The early Christians agreed that work was punishment and added that its products must be shared with the needy. Protestants helped change the view of work to a source of grace. Luther considered work the best way to serve God and earn salvation. Citizens of contemporary Western culture view work as activity that transforms raw nature into that which serves societal needs. They define work as "the effort or activity of an individual performed for the purpose of providing goods or services of value to others; it is also considered to be work by the individual so involved" (Hall, 1986, p. 13). According to this definition work cannot be defined solely as a type of activity. Different individuals, or the same individual at different times or in different situations, may consider the same activity either work or play. How then do people determine whether one of their activities is work?

People know they are working when they forgo present pleasures for future rewards. A future orientation distinguishes the personal experience of work and play. Human beings work because they can imagine the future and worry about surviving in that future. Work involves channeling drives into making tomorrow better than today. The aggression involved in attacking medical studies, making a killing in the stock market, or carving a
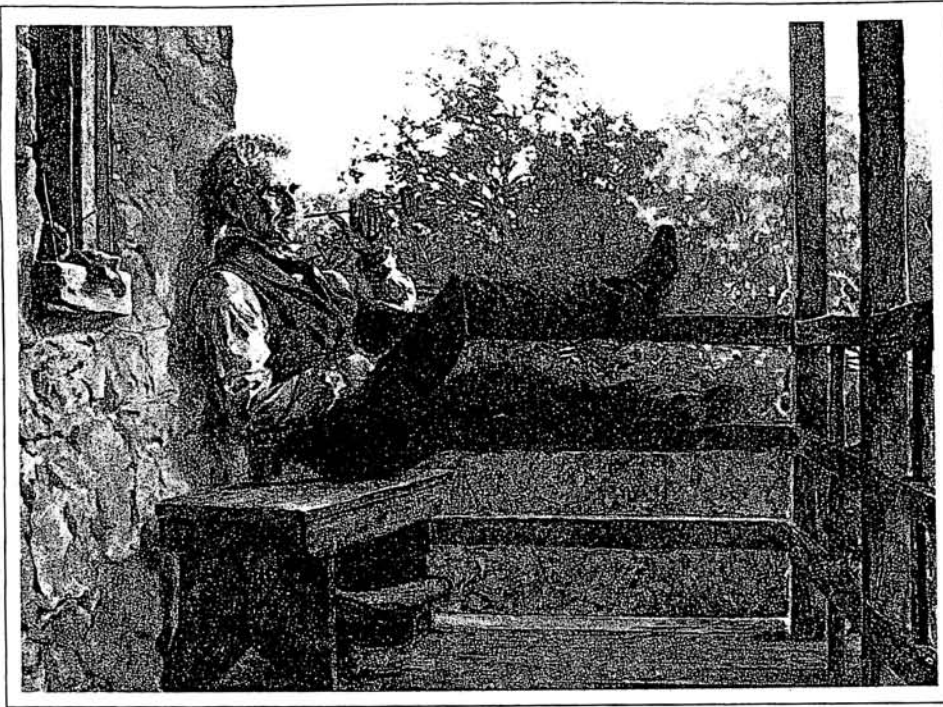
tree into a chair all improve an individual's future. Constructive aggression manages objects and ideas, allowing individuals to control their environment and to feel a sense of mastery. Society's most accomplished workers use their time efficiently to produce more while they compete with their previous performance or that of other workers. What an individual produces affords a sense of identity based on the objective and active "I did it," rather than the subjective "I feel it" or the passive "I own it." Accordingly, as people work, they feel goal directed, constructive, in control, efficient, productive, achieving, and self-defined. It is no accident that many of the characteristics that define the personal experience of work are also used to define mental health. Psychologists maintain that future orientation is an essential ingredient in mental health. Thus individuals who work productively are well on their way to mental health and a secure place in society. They know that because they produce things that others value, they are valued in return.

However, relative to physical and mental health, more work can mean less well-being. Too much work is almost as maladaptive as too little work. Compulsive ambition, aggression, control, efficiency, productivity, competition, and self-definition—what some have labeled **the failure of success**—reduce life expectancy and quality. Individuals who feel a sense of personal competence and belongingness use work to contribute, cooperate, and earn a living. By attending to occupational requirements, they can comfortably begin and end each day's work. In contrast, those people who lack a sense of belonging or personal competence use

work to bind their anxiety, protect their fragile self-esteem, or avoid friendship and intimacy. Instead of attending to occupational requirements, they concentrate on *how* they are doing rather than *what* they are doing. They try to convince themselves and others that they are worth more, not worthless. They rigidly do more and more in a fruitless struggle to validate their worth.

Excessive attention to how an individual is doing at work leads to a characteristic work-style. To bind anxiety, reduce insecurity, or avoid liking and loving, the individual must exaggerate work's importance. This approach leads to an excessive goal orientation that requires compulsive planning and worrying. *Being* goals (such as I want to be a great physician) overshadow *doing* goals (such as I want to help sick people). Efficiency becomes time urgency and impatience. Constructive aggression detaches from "what is required" and attaches to "how good I am." Free-floating hostility emerges and serves to deflect any threats to self-esteem. Compulsive competitiveness about almost everything and with almost everyone causes the successful failure to view co-workers as challengers in a zero-sum contest for a limited supply of power, prestige, and possessions. Healthy productivity and self-evaluation yield to an obsession with keeping score and winning the contest. Cynicism and distrust toward co-workers generate unreasonable and dominating behaviors. Rather than using work to build an identity as a prelude to joint identity or intimacy, the successful failure uses work to maintain rigid identity boundaries and thus hold friendship and love at bay.

Taken together, competitiveness, time urgency,

impatience, hostility, and overinvolvement in work have been called the **Type A behavior syndrome.** Friedman (1969) defined Type A behavior as an

action emotion complex which is exhibited by those individuals who are engaged in a relatively chronic struggle to obtain an unlimited number of poorly defined things from their environment in the shortest period of time, and if necessary, against the opposing efforts of other things or persons in the same environment. (p. 84)

As individuals with Type A styles engage in daily combat with time and co-workers, their exertion places them at risk for personality deterioration, emotional exhaustion, or pathophysiological processes associated with coronary heart disease (CHD). An individual need not be gainfully employed to exhibit Type A behaviors. Homemakers with a Type A work-style report more daily stress, less self-esteem, and poorer health (Houston & Kelly, 1987).

After an extensive literature review, Matthews and Haynes (1986) concluded that Type A behavior relates to risk for CHD, particularly among males in white-collar jobs, and that this relation may be causal. Researchers who consider Type A behavior an independent predictor of the incidence of CHD hypothesize that Type A workers chronically respond to various environmental events with greater sympathetic nervous system and adrenomedullary activity. Glass (1977) posited a link between this heightened responsivity and the need for control, asserting that the Type A individual manifests a constant struggle to maintain control over the environment. Research data support this assertion and suggest that Type A workers tend to resist loss of control, even when it would be to their advantage to relinquish control. Data further indicate that Type A workers increase their Type A behaviors when they perceive a situation as moderately uncontrollable instead of highly uncontrollable (Benight & Kinicki, 1988).

Recent studies have begun to examine the component behaviors in the global Type A behavior syndrome. Initial results have implicated competitive drive, impatience, and potential for hostility in coronary disease syndromes (Matthews et al., 1977). In a recent review article Williams (1987) listed hostility, cynicism, and anger as the critical "toxic" components in Type A behavior. In a frequently cited article Barefoot et al. (1983) reported the results of a 25-year follow-up study of 255 physicians who had taken the Minnesota Multiphasic Personality Inventory during their psychiatry clerkship. Physicians who, 25 years earlier, had scored above the median (14 or more points) on the Hostility Scale had a cumulative CHD incidence 5 times higher than those who had scored 13 or below. Examining mortality from all causes, the researchers found 6.4 times greater mortality for physicians who had scored 14 or higher. By 1980,

133 of the 136 physicians who had scored less than 14 were still living, as compared with 103 of the 119 physicians who had scored 14 or more.

Two reports have linked hostility to angiographic findings. MacDougall et al. (1985) at Massachusetts General Hospital replicated a previous study they had done at Duke University Medical Center. In both studies global Type A behavior syndrome did not relate to extent of coronary artery disease (CAD) but potential for hostility and holding in anger did relate. These authors argued for a reconceptualization of Type A definitions and assessments. Taking issue, Rosenman (1986) warned that single variables, such as control or hostility, may lead to oversimplified interpretations. He advised researchers to consider the interactive potential of all the variables because, for example, need for control may arise from competitive drive. If ineffective anger management is indeed the dominant toxic agent, Type A intervention programs should target anger prevention and management.

Available experimental evidence on altering Type A behavior is positive (Matthews & Haynes, 1986); however, habits deeply ingrained since childhood die hard, especially when these habitual work behaviors lead to occupational success and tangible societal rewards. Because many workers derive status, pride, and financial security from Type A behaviors, they are reluctant to consider the possibility that these behaviors are causal factors in CHD and mental distress. Noting this resistance, Rosenman and Chesney (1982) concluded that intervention can modify Type A behaviors more readily in postinfarction patients than in healthy individuals.

Among the experimental interventions tried, cognitive training in stress management shows the best potential for reducing Type A behaviors (Rosenman, 1986; Rosenman & Chesney, 1982; Roskies et al., 1986). Friedman and Ulmer (1984) devised a cognitive approach to changing Type A belief systems. They observed, over a 4-year period, that the rate of coronary recurrence among individuals who had received Type A counseling and coronary counseling was half that of individuals who had received only coronary counseling. In Friedman and Ulmer's Type A counseling approach, physicians help patients to explore and appreciate seven beliefs:

1. Type A behavior hinders and never helps a career.
2. Type A behavior can be changed.
3. Sweetness is not a weakness.
4. Material things cannot ameliorate insecurity or inadequate self-esteem.
5. Trivial errors of other people do not always require your preoccupation or correction.
6. Things worth *being* are more important than things worth *having*.

7. The means should justify the end.

In addition, patients practice behavioral drills to employ wisdom and perspective, distinguish instances from crises, allot time for solitude, cultivate friendship, verbalize affection to friends and family members, avoid polyphasic activities, substitute metaphors for numbers, and renew daily awareness of persons, pets, and plants.

Essentially, programs to modify Type A behavior teach patients to balance work with love, which is expressed through play, intimacy, and worship. The programs are founded on the assumption that life is best lived by balancing goals with spontaneity. Competition must alternate with cooperation, aggression with altruism, efficiency with patience, control with reciprocity, and identity with empathy. Balancing work with love allows an individual to relax, repair the damages done by work, and recreate himself or herself.

OCCUPATION

"When you come to a patient's house, you should ask him what sort of pains he has, what caused them, how many days he has been ill, whether the bowels are working, and what sort of food he eats." So says Hippocrates in his work Affections. I may venture to add one more question: What occupation does he follow?

C. RAMAZZINI

Diseases of Workers (c. 1700)

Thus far we have examined work as a cultural role and a personal experience. In this section we consider occupation as a source of social identity. "An **occupation** is the social role performed by adult members of a society that directly and/or indirectly yields social and financial consequences and that constitutes a major focus in the life of an adult" (Hall, 1969, pp. 5-6). **Work** is the activity performed in an occupational role. Asking people about their work implies interest in their activities, whereas asking them about their occupation implies interest in their social status.

Occupations emerge in human societies when survival no longer demands that individuals do everything for themselves. The division of labor within a society structures its social order. An individual's occupation then profoundly affects his or her social status and experience within the society. Hunting and gathering societies typically divide work by sex; males work outside and females work inside the home. In fact, during the early part of this century in the United States, men were still socially expected to work outside the home to support the family monetarily and women were expected to work inside the home to support the family emotionally. Italian law in 1938 allowed only 10% of the adult female population to be gainfully employed. With the sweeping economic and social changes that World War II introduced, women entered the labor force in greater numbers. As a result of the currency inflation of the 1970s and escalating press for sexual equality, women's representation in the occupational work force of the United States increased from 32% in 1960 to 53% in 1983 and remained at that level through the 1980s. Sexual segregation of labor within occupations has replaced the earlier labor segregation between home and occupation. Women who work outside the home in industrial societies tend to be channeled into light work or jobs, such as teaching children, pediatrics, and nursing, that extend their traditional nurturing role. In 1969 half the females in the work force were employed in only 21 occupations. Even with the social movements and government intervention of the 1970s, only minor changes in occupational sex segregation occurred through the early 1980s (Albelda, 1986). Bielby and Baron (1984) reported that 59% of 400 California companies were still completely segregated by sex. In a study of 1071 different jobs in 100 establishments, Baron et al., (1986) found only 73 jobs with both male and female incumbents; the other 998 jobs had either all male or all female incumbents.

Occupational sex segregation is implicated in most of the problems that trouble women in the workplace. For example, sex segregation allows differential pay for comparable work, short career ladders that block advancement, stereotypes of "women's work" that devalue certain jobs, treatment of women as casual workers who come and go depending on family responsibilities, and sexual harassment. As a result, women who work in traditional female-dominated (70% or more) occupations report more depression and anxiety and less self-esteem and job satisfaction than women who work in either male-dominated or neither-sex-dominated occupations (Harlan & Jansen, 1987). In multicultural societies, occupational segregation by race also thwarts self-realization and limits social contributions from minority group members. Throughout its history, U.S. society has depended on minority workers to do its least desirable work. Moreover, minorities are more likely to be unemployed or to be employed in occupations with higher risk for disability and disease. Although much remains to be done to equalize occupational opportunity across races, statistics indicate that the level of occupational segregation by race fell substantially from 1958 to 1981. Unfortunately, segregation by sex showed only a small change during the same period (Albelda, 1986). Today, being female has a greater impact on black female wages than does being black (Cotton, 1988). It is unfortunate that sex and race should prove to be such powerful predictors of occupa-

TABLE 11-2

Life expectancy
by occupation*

Socio-occupational category	Number of survivors at age 75 per 1000 living at age 35	Life expectancy at age 35 (yr)†
Teachers (public)	572	40.8
Liberal professions and top management	555	40.3
Catholic clergy	518	39.2
Middle management (public)	507	38.9
Technicians (private)	517	39.2
Middle management (private)	490	38.4
Skilled workers (public)	481	38.2
Foremen (private)	459	37.6
Farmers	443	37.2
Office workers (private)	465	37.7
Shopkeepers and craft tradesmen	464	37.6
Office workers (public)	450	37.3
Semiskilled workers (public)	417	36.3
Skilled workers (private)	374	35.2
Semiskilled workers (private)	368	34.9
Agricultural wage earners	366	34.9
Laborers	331	33.5
TOTAL POPULATION	407	36.0

From Organization for Economic Cooperation and Development (1979). *Socio-economic policies for the elderly* (p. 15). Washington, DC: OECD Publications and Information Center (distributor).
*In reality, life expectancy is calculated by means of mortality quotients for one or several years. The figures here are estimates, since the mortality quotients after age 75 are not observed.
†Life expectancy at age 35 within a population is the average number of years lived beyond age 35 by the individuals who reach age 35.

tional role in a society striving toward the democratic ideal of living and working together as equals.

Two distinct lines of research address the effects of occupations on workers' well-being; the first deals with occupations themselves and uses epidemiologic methods to study differences among occupational groups, and the second deals with congruence between occupations and workers. Table 11-2 illustrates a simple example of occupational differences research, which shows that life expectancies vary by occupation. In a more complex example of occupational differences research, Karasek and his colleagues (1981) proposed that work demands and control (operationally defined as range of decision-making freedom or latitude) jointly influence levels of psychological and physiological distress. In their view, work demands both motivate and stress workers, whereas decision latitude allows them to direct that motivation and release stress. Because high-demand/low-control work situations increase workers' stress while preventing its release, these situations place workers at greater risk for mental distress and CHD. Rushed tempo and lack of situational control are associated statistically with marked elevation of blood pressure and heart rate.

In a study to test their theoretical model, Karasek and his colleagues (1988) assessed 221 occupations for **control** and **demand**. They operationally defined amount of **strain** for each occupation as a multiplicative function of control times demand. Occupations in the top 10% for strain included cashier and waiter; those in the bottom 10% included forester, natural scientist, and civil engineer. The researchers then assigned a strain score based on occupation to 4833 men who had participated in two national health surveys and found that men in the top 10% for occupational strain had 3.8 (in one survey group) and 4.8 (in the other survey group) times the risk for myocardial infarction (MI) when compared with men in the bottom 10%. In a second analysis they found that men in the top 20% for occupational strain had 2.5 and 3.3 times, respectively, the risk of MI as the rest of the group. When they controlled for age, occupational strain accounted for 25% and 33%, respectively, of MI prevalence. This magnitude is similar to that for smoking and for serum cholesterol reported in other studies.

The second line of research on occupations and well-being deals with congruence between occupations and workers. The theory that guides this research operationally defines **congruence** between occupational role and worker personality as the degree to which individual abilities and needs correspond to occupational activities and rewards. High congruence means that the individual can fulfill the occupation's requirements and that the occupation can fulfill the individual's. On the one hand, the match between an individual's abilities and the occupation's tasks relates to **success** and
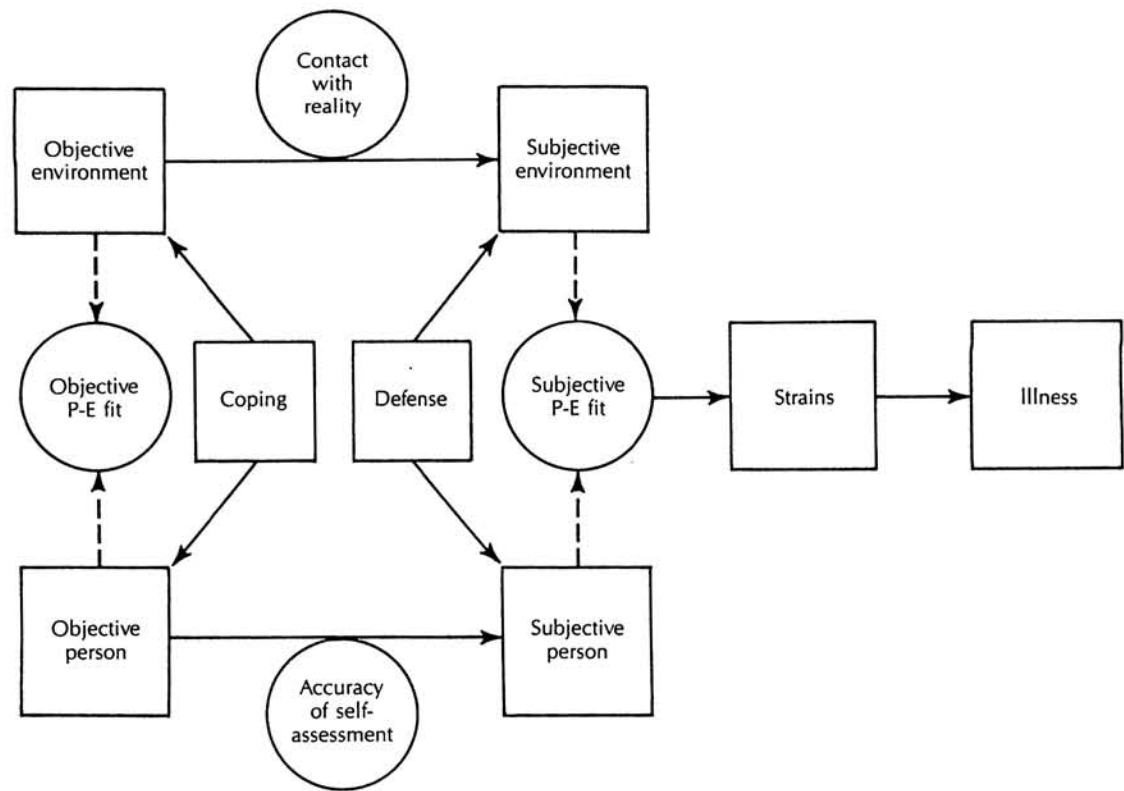
FIGURE 11-1

A model describing the effects of psychosocial stress in terms of fit between the person and the environment. Concepts within circles are discrepancies between the two adjoining concepts. Solid lines indicate causal effects. Broken lines indicate contributions to interaction effects. (From Harrison, R. [1978]. Person-environment fit and job stress. In C. L. Cooper and R. Payne [Eds.], *Stress at work* [p. 180]. New York: Wiley.)

influences employer decisions regarding retention, promotion, and transfer. On the other hand, the match between an individual's needs and the occupation's rewards relates to employee **satisfaction** and desire to remain in an occupation. Together, success and satisfaction predict occupational stability or tenure. An extensive body of research indicates that congruence explains about 10% to 15% of satisfaction with an occupation (Assouline & Meir, 1987). The empirical support for the relation of congruence to occupational success and stability, although less extensive, does suggest an association.

Long before empirical research supported the congruence hypothesis, Parsons (1909/1967) wrote that people should gain self-knowledge, gather occupational information, and then use reasoning to match themselves to an occupation. This seminal paradigm for the practice of vocational counseling implemented the commonsense idea that round pegs fit best in round holes and led to the construction of occupational aptitude tests and vocational interest inventories. The former measure a person's capacities and match them to occu-

pational requirements. The latter measure degree of similarity between the testee and groups of satisfied and successful workers in a variety of occupations. Based on both aptitude test and interest inventory results, vocational counselors help individuals to identify and explore those occupations in which they are most likely to achieve success and experience satisfaction. In recent studies of occupations with distinct specialties, satisfaction has been shown to relate more strongly to specialty congruence than to occupational congruence (Meir & Yaari, 1988). To examine a specialty interest inventory for physicians see Meir and Engel (1986).

JOB

I have now no relief but in action. I am becoming incapable of rest. I am quite confident I should rust, break, and die if I spared myself. Much better to die doing.

CHARLES DICKENS (who died of heart disease thought to be exacerbated by his work habits)

After choosing an occupation, a person must obtain a job within that occupation. A job exists in a particular establishment at a specific site; within any one occupation many jobs vary slightly across different locales and establishments. For example, the job of a family physician in an urban academic health center differs from that of a family physician in a rural health clinic. Even if these two physicians perform identical work, their jobs differ with respect to contextual variables such as organizational climate, supervisor style, co-worker personalities, pace, pay, and productivity norms.

Having obtained a job, an individual must then adjust to it. The social environment and mental health research team at the University of Michigan's Institute for Social Research (Harrison, 1978) has proposed a dynamic model of job adjustment that distinguishes between objective and subjective fit. Objective fit refers to the correspondence of the actual environment (independent of an individual's perception of it) to the person as he or she really is. Subjective fit refers to the correspondence between a person's perception of the environment and that person's self-concept. Researchers can calculate four indexes of fit by measuring the same dimension relative to the objective environment, objective person, subjective environment, and subjective person. The Michigan group illustrated these indexes using typing speed as a dimension. A clerk who believes that he or she is capable of typing 55 words per minute (subjective person) may actually be able to type 40 words per minute (objective person). The supervisor may expect the clerk to type 70 words per minute (objective environment), and the clerk may think that the supervisor expects her or him to type 60 words per minute (subjective environment). Using these numbers, researchers can assess the clerk's subjective person-environment (P-E) fit, objective P-E fit, contact with reality, and accuracy of self-assessment as outlined in Figure 11-1. Each of these four indexes reflects an aspect of fit, and minimal discrepancy scores for each of the four comparisons indicate good fit.

Researchers use these discrepancy scores to define job stress operationally. The stress stimuli occasioned by a poor person-job fit (sometimes called job stressors) can be almost endless. (For a list see Holt, 1982.) Fortunately, Osipow and Spokane's (1987) six major categories of job stress bring conceptual clarity to the field:

1. Role overload: too much work, too few resources
2. Role insufficiency: too little work or use of talents
3. Role ambiguity: unclear expectations or evaluation standards
4. Role boundary: conflicting demands or loyalties

Heavy the Oar to Him Who Is Tired, Heavy the Coat, Heavy the Sea
Ivan Le Lorraine Albright (1929).
Oil on canvas, 135.6 × 87 cm, Gift of Mr. & Mrs. Earle Ludgin.
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5. Responsibility: too much responsibility for other people or things
6. Physical environment: exposure to noxious stimuli, shift rotation, or isolation

To distinguish these job stresses from their effects on workers, researchers define **job stress** as pressures that challenge the worker and **personal strain** as the injurious effects of those pressures on the worker. Researchers have variously categorized strains. (For a list see Holt, 1982.) Again, Osipow and Spokane (1987) offer a parsimonious set of categories to comprehend strain. Psychological strain includes affective responses such as anxiety, demoralization, and hostility. Physical strain includes sleeping and eating problems, alcohol and drug abuse, and smoking. Interpersonal strains manifest themselves in such social behaviors as withdrawal, isolation, and anger. Vocational strain is reflected by reduced work attendance, productivity, and job satisfaction. As strain accumulates over time, an individual may become increasingly susceptible to distress, that is, various mental and physical illnesses.

Every worker experiences some amount of job stress. Thus rather than asking a patient, "Do you have any stress on your job?" a physician should ask, "What stress do you encounter at work, and how do you deal with it?" Then the physician may assess the soundness of the patient's responses to

job stress and determine whether personal strain has occurred. The Michigan group (Harrison, 1978) explicated two basic types of responses to stress. **Coping responses** change the objective environment or objective self to improve P-E fit. Through conscious, accurate, and socially reasonable actions these responses deal with demands, solve problems, and help the individual tolerate greater amounts of stress. In contrast to the direct action of coping responses, **defensive responses** involve interpretative reappraisals that reduce the stress of subjective P-E misfit through some negation or distortion of objective reality. Unlike coping responses, defensive responses are unconscious, inaccurate, and unreasonable. Although they do not solve problems, they do safeguard self-esteem and reduce tension, anger, and depression. Defenses usually produce rigid and fragmented behaviors that work only in the short run because they prompt no new learning about the objective environment or objective self; in the long run they actually increase threat. In effect, coping improves fit, whereas defense maintains misfit while reducing perceived stress.

Although only trained observers can recognize all the classic defenses described in Chapter 18, almost everyone can recognize the ordinary tactics workers use to safeguard their self-esteem. Menaghan and Merves (1984) categorized these defensive tactics into three groups. Workers who use the first tactic, **optimistic comparison**, view themselves as better than their peers, the present as better than the past, and the future as likely to be better than the present. Workers who use the second tactic, **selective inattention**, find positives to counter the negatives in a situation, immerse themselves in the pleasant aspects of a job, and downplay the importance of work as compared with friendship, play, and love. Workers who use the third tactic, **restricted expectations**, accept unsatisfying job conditions as inevitable and concentrate not on the job itself but on outcomes such as money, security, and vacations.

Coping reduces stress, and defense delays strain and its consequences. However, when workers do experience strain, they may use palliative responses to ease their discomfort. Three types of responses help people live with strain and discharge some of its effects. Social support garnered by talking with sympathetic people allows catharsis. Recreational play interrupts thoughts about job stress and alleviates anxiety and anger. Self-care, such as proper nutrition, sleep, and exercise, dissipates the physical tensions that accompany strain and increases the energy available for coping responses. As a group, social support, recreation, and self-care often help people turn problems into opportunities and empower them to actively master what once had been passively suffered.

Because most studies of job stress, strain, and distress have used self-report measures and cross-sectional designs, their data include correlation, not causality. Stress and strain relate consistently to many types of distress, including depression, low self-esteem, high blood pressure, change in blood eosinophils, elevated serum cholesterol levels, stuttering, and increased physician visits. These studies suggest strong relationships among P-E misfit, strain, and illness but do not explain these relationships. Initial evidence suggests that strain may cause mental and physical illness; to date, no theory adequately explains these findings.

In constructing an adequate theory to account for relationships among stress, strain, and illness, theorists must explain some intriguing research findings. French (1974) found that the greatest job satisfaction and the lowest level of serum cholesterol did not occur among men with perfect P-E fit but occurred among men who had slightly more responsibility for others than they reported wanting. Data from a second intriguing study reported by Coburn (1975) indicated that subjective P-E fit had much larger effects on health than did objective P-E fit. Further research is needed to understand Menaghan and Merves's (1984) finding that coping had little effect in improving fit and Osipow and Davis's (1988) finding that coping was largely unsuccessful in moderating the stress-strain relationship. Even without research we know that one coping strategy that clearly can reduce occupational stress is to change jobs.

CAREER

To find one's work is to find one's place in the world.
RICHARD C. CABOT

The topic of job change brings us to a fifth and final perspective on work and adjustment—the longitudinal, developmental view. The term **career** denotes the sequence of jobs occupied throughout an individual's work life. People experience numerous job changes while their careers unfold across time. Some work in three or more occupational fields during their careers and experience dramatic life changes when they move from one field to another. Other people, such as physicians, may spend the majority of their working life in one occupation yet make numerous job changes as they move among different hospitals. Even people who work in one job for the same employer during their entire career may experience significant career transitions.

Dealing with a career that consists of changes requires adaptability. Box 11-1 lists major changes that many people experience during their careers. In particular, **retirement** and **job loss** have been convincingly associated with decreases in morale, health, income, and social functioning such as de-

terioration of family life. For example, the personal devastation associated with job loss may decrease self-esteem and health and increase the risk of suicide, severe depression, and substance abuse (Mallinckrodt & Fretz, 1988). Less extensive research has related the other job changes listed in Box 11-1 to the onset and intensity of physical and mental illness and has quantified the amount of social readjustment required (Ruch, 1977). Clearly job changes can threaten an individual's morale, health, and economic status, although the events in themselves are not necessarily harmful (Ekerdt, 1987; Kagan, 1987; Kasl & Cobb, 1982).

Whether a person experiences trauma with a job change depends on both the person and the event. Personal properties, such as career commitment and control, combine with situational properties, such as novelty, predictability, and timing, as the person strives to invest the event with meaning (Lazarus & Folkman, 1984). The personal meaning of a change shapes an individual's response to it. People who objectively appraise an event and have the coping capacity to handle it may emerge from a career transition happier and healthier. Other people facing the same change may misinterpret its meaning or lack the capacity to deal with it; for them the transition becomes demoralizing and a threat to their emotional and physical well-being. Some workers cope with job loss by viewing it as an opportunity to enter an occupation about which they had dreamed. Although they had been afraid to quit their jobs to pursue that dream, the job loss prompted them to chase their dreams before settling for just another job. Other workers may view job loss as the last straw and withdraw entirely from work and other life roles. The *New York Times* once reported a dramatic story about a worker who, confronted with his plant closing, went home, refused to eat, and eventually died of malnutrition.

A significant percentage of primary care physicians' patients are experiencing career transitions. Often, demoralization has triggered their physical symptoms. The physician who suspects that a career transition may be affecting a patient's mental and physical health can help the patient cognitively by exploring the meaning of the career transition and correcting mistaken ideas about it and emotionally by allowing affective catharsis, instilling hope, and encouraging effort. At a minimum the physician should help the patient physically. Because personal and social readjustments of a career transition are frequently accompanied by changes in patients' self-care practices (Wiebe & McCallum, 1986), physicians can help their patients avoid or reduce stress-related health problems during career transitions by encouraging sound health practices relative to sleep, exercise, elimination, dental hygiene, smoking, alcohol use, and nutrition.

Entering of labor force for first time
Promotion
Demotion
Overpromotion
Change in shift pattern
Change in place of work
Qualitative change in job
Greatly increased work load
Job change
Occupation change
Job loss
Exiting from labor force for parenting role
Reentering labor force after period of not working
Being laid off
Null change (nonevent such as not being promoted)
Retirement

BOX 11-1
Examples of changes that may occur during a career

SUMMARY

In this chapter we consider work from five perspectives. First, work is the core role with which our culture structures life. Second, we explain how individuals differ in the personal meaning they invest in work roles and in how they work. Third, occupation is discussed as an element in the social structure and as a source of identity. This leads to, fourth, a conception of jobs as person-environment interactions that require adjustment through the use of coping or defensive responses. Fifth and finally, career transitions are seen as challenges to people to develop and adapt, and transitions were shown to precipitate emotional and physical health problems.

One or more of these topics may be at issue in a patient's life. In fact, the five issues may characterize the life situation of certain patients. Immigrant and culturally different patients may have trouble relating to the dominant culture's view of work and its importance. Work-style issues may trouble successful executives and professionals, as well as marginal workers with histories of absenteeism and low productivity. Occupational segregation caused by sexism, racism, or ageism may thwart the self-expression and personal development of homemakers divorced from their spouses, people discriminated against by society, and older workers displaced by technology. Psychological, physical, social, or vocational strain may trouble people with jobs that bore or overwhelm them. Career transitions may be at issue for midcareer changers and retirees. Depending on the circumstance, a physician may find it useful to ask a patient about work, work-style, occupational identity, job stress, and career transitions. A physician who wants to know his or her patient as a person needs to learn what work does for and to that person.

STUDY QUESTIONS

Select the best answer

1. The most toxic component of Type A behavior as determined by incidence and severity of coronary heart disease and coronary artery disease may be:
   A. An individual's compulsive need to control his or her environment
   B. Relentless competitiveness
   C. Hostility
   D. Emotional and physical fatigue caused by chronic overexertion
   E. Impatience

2. Individuals first learn about the roles and rules of the world of work:
   A. During free play activities with peers
   B. In infant-caretaker interactions
   C. In high school
   D. When they enter their first real job
   E. In elementary school

3. According to Palmore (1969), when age is controlled, the strongest predictor of longevity is:
   A. Genetic predisposition
   B. Work satisfaction
   C. Physical functioning
   D. Use of tobacco or alcohol or both
   E. Performance IQ

4. Work is to play as _____ is to _____
   A. Present—future
   B. Future—past
   C. Future—present
   D. Past—future
   E. Present—past

In the following questions select:
   A. If only 1, 2, and 3 are correct
   B. If only 1 and 3 are correct
   C. If only 2 and 4 are correct
   D. If only 4 is correct
   E. If all are correct

5. In a longitudinal study of 456 inner-city males, Vaillant & Vaillant (1981) found that teenage levels of participation in extracurricular and regular school activities, part-time jobs and household chores, consistency of IQ and grades, and general playfulness related to adult:
   1. Salary
   2. Unemployment
   3. Emotional well-being
   4. Generative behaviors

6. Karasek and his colleagues (1981) defended occupational strain in terms of:
   1. Level of work demands
   2. Competing family and work responsibilities
   3. Range of decision-making freedom
   4. Hierarchical structure of the organization

7. Defensive responses to occupational stress:
   1. Safeguard self-esteem
   2. Are unconscious
   3. Reduce subjective person-environment misfit
   4. Distort or negate reality

8. A physician can help a patient who reports feeling depressed about a career transition by:
   1. Encouraging the maintenance of good health practices
   2. Prescribing a mild antidepressant
   3. Exploring the meaning for the patient of the situation
   4. Discouraging the patient from dwelling on the feelings of depression

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