

The Relationship of Workaholism With Work–Life Conflict, Life Satisfaction, and Purpose in Life

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This study examined the differences between 2 types of workaholics (enthusiastic and nonenthusiastic workaholics) and nonworkaholic workers (work enthusiasts, relaxed workers, unengaged workers, and disenchanting workers) with respect to work–life conflict, life satisfaction, and purpose in life in a sample of 171 salaried employees of a high technology organization. Results differed for the 2 types of workaholics, supporting the importance of continued differentiation of workaholic types. Nonenthusiastic workaholics were found to have significantly more work–life conflict and significantly less life satisfaction and purpose in life than 3 of the 4 types of nonworkaholics. Enthusiastic workaholics were found to have significantly more life satisfaction and purpose in life than nonenthusiastic workaholics and significantly more work–life conflict than 3 of the 4 nonworkaholics. Implications for career planning and counseling are discussed.

Most executives value and often promote the driven employee who is hardworking, very involved with the job, and habitually devotes 50, 60, or even 70 hours a week. As a *Fortune* magazine cover article states, “In many respects, these people are an employer’s dream. They work hard, probably too hard, impelled by both joy and fear” (Kiechel, 1989, p. 50). Likewise, McGuire (1999) quoted Linda Rosenstock, the director of the National Institute for Occupational Safety and Health, in a recent front-page *APA Monitor* article: “The most dramatic change we have seen in the United States is the rapid and remarkable increase, in a relatively short period of time, in the number of workers working longer hours” (p. 1). As work hours increase, employees struggle to balance personal and family needs with work demands. The stress this induces is causing some workers to seek counseling (Killinger, 1991). Consequently, understanding how workaholic behavior patterns and work–life conflict relate to employee life satisfaction and psychological well-being is of considerable importance to mental health professionals and career counselors. In fact, Hansen (1995) identified workaholism as an area where counseling psychology can make a substantial contribution in the years to come.

Oates (1971) first coined the term *workaholism* over 25 years ago as “addiction to work, the compulsion or the uncontrollable need to work incessantly” (p. 1). Since that time, researchers have defined workaholism in different ways, both positively and negatively (Machlowitz, 1980; Porter, 1996; Scott, Moore, & Miceli,

1997). (For a more detailed description of the history of definitions of workaholism, see Spence & Robbins, 1992.) For the purpose of this study, we examined two types of workaholics, as defined and identified by Spence and Robbins, the *enthusiastic workaholic* and the *nonenthusiastic workaholic*. Both types are defined as persons exhibiting high work involvement and a high drive to work. However, the enthusiastic workaholic reports high enjoyment of work, in contrast with the nonenthusiastic workaholic, who reports low enjoyment of work (Spence & Robbins, 1992).

Thorne (1987) described workaholism as an apparently acceptable addiction that many are quick to claim. Even the sages of corporate America are self-proclaimed workaholics (Ellis, 1995). Thus, the workaholic appears to be valued in society. However, evidence of negative consequences of workaholism is emerging. Preliminary research has revealed that workaholics report higher levels of stress, exhibit higher levels of perfectionism, claim more health-related problems, and are less likely to delegate work to others when compared to most nonworkaholic workers (Kanai, Wakabayashi, & Fling, 1996; Spence & Robbins, 1992). In many jobs, perfectionism and failure to delegate can slow progress and reduce flexibility and efficiency; thus, these traits can represent a performance problem in today’s fast-paced, competitive environment. This suggests that workaholics possess characteristics that employers do not desire and that workaholism may be detrimental to workers and their families, although these hypotheses remain largely untested thus far. Seybold and Salomone (1994) emphasized the need for research on workaholism to understand its impact on counseling psychology. Likewise, Scott et al. (1997) emphasized the need to understand the relationship between workaholism and various outcomes, including levels of anxiety, stress, and physical and psychological problems, as well as creativity, job satisfaction, and life satisfaction.

Other researchers have also identified burnout as a potential negative outcome associated with workaholism (Lowman, 1993; Porter, 1996; Scott et al., 1997). Burnout, a three-dimensional construct, has been described as “a syndrome of emotional exhaustion, depersonalization, and reduced personal accomplishment that

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can occur among individuals who do 'people work' of some kind" (Maslach, 1982, p. 3). Excessive work and the associated high job stress (Spence & Robbins, 1992) may lead to burnout (Lowman, 1993; Scott et al., 1997). Maslach and Leiter (1997) identified work overload as one of six potential sources of burnout.

There are currently three causal explanations for why workaholics dedicate excessive hours to work. The first explanation is attributed to the immense enjoyment and fulfillment derived from doing work tasks. In some cases, people lose a sense of time and even forget to eat when immersed in their work. This explanation reflects the view promoted by Machlowitz (1980) and Scott et al. (1997) in their description of the achievement-oriented workaholic, which is consistent with the enthusiastic workaholic as defined in this study. 'Fun,' 'creative,' and 'stimulating' are words these hard workers use to describe their work experience (Kiechel, 1989, p. 51).

The second explanation for excessive work is the uncontrollable urge or need to work, even when little or only momentary satisfaction is derived. Some researchers have endorsed this view of the workaholic as an obsessive-compulsive personality (Chonko, 1983; Naughton, 1987). Excessive devotion to work to the exclusion of other activities, such as time with friends and family or leisure, is listed as one of the diagnostic criteria for Obsessive-Compulsive Personality Disorder (OCPD) in the *Diagnostic and Statistical Manual of Mental Disorders, 4th ed. (DSM-IV;* American Psychiatric Association, 1994). The *DSM-IV* describes OCPD as "a pervasive pattern of preoccupation with orderliness, perfectionism, and mental and interpersonal control, at the expense of flexibility, openness, and efficiency" (p. 672). This explanation most likely represents the nonenthusiastic workaholics as defined for this study.

The third explanation for excessive work behavior may be rooted in the desire for the emotional "rush" from receiving the rewards of hard work (Kiechel, 1989, p. 53). The craving for reward and recognition may grow until work crowds out family and almost all other activities. This explanation captures the addiction model of workaholism. The similarity between behavior patterns of workaholics and alcoholics is the reason Oates (1971) coined the term *workaholism* decades ago. The view of the workaholic as an addict has also received attention in the literature (Porter, 1996). The characteristic behaviors of a workaholic appear to fit the criteria for substance dependence as given in the *DSM-IV* (American Psychiatric Association, 1994). The three most obvious criteria are: (a) "a great deal of time is spent in activities necessary to" perform work, (b) "important social . . . or recreational activities are given up or reduced because of" time spent working, and (c) excessive time spent working "is continued despite knowledge of having a persistent or recurrent physical or psychological problem that is likely to have been caused or exacerbated by the" excessive time spent working (p. 181).

Whether the cause is enjoyment-fulfillment, obsession-compulsion, or addiction, spending excessive time working is clearly one of the hallmarks of the workaholic and is implied by existing definitions (Machlowitz, 1980; Oates, 1971). Because time is a fixed resource, excessive work hours or additional hours spent on nonjob work activities necessarily detract from time available to share with friends and family and to pursue leisure. The fallout of the workaholic behavior pattern is to upset the balance between work and personal time, or work-life balance.

People typically use this personal time to maintain meaningful interpersonal relationships outside of work, such as spousal and family relationships, and to participate in recreation, rest, and renewal. Participation in supportive relationships and regular times of renewal help protect against the health consequences of life stress (Cobb, 1976), but the workaholic spends less time in these important protective activities. As a result, one would expect that the workaholic experiences higher levels of stress and, correspondingly, may be more prone to stress-induced illnesses.

Only two empirical studies examining these relationships have been published to date, both suggesting that workaholics report higher levels of job stress than nonworkaholics. Spence and Robbins (1992) analyzed surveys completed by 291 social workers (54% women) holding academic appointments. The authors developed and used the workaholism scales (Driven to Work, Work Involvement, and Enjoyment of Work) to define six worker types, including two kinds of workaholics, the *enthusiastic workaholic* and the *nonenthusiastic workaholic*, and four types of nonworkaholics, *work enthusiasts*, *relaxed workers*, *unengaged workers*, and *disenchanted workers*. The pattern of scale scores corresponding to each worker type appears in Table 1. Additional constructs measured in the study were job stress, time commitment, perfectionism, nondelegation, and health complaints and behaviors. Results indicate that in general, both types of workaholics scored higher on perfectionism, nondelegation, and job stress than work enthusiasts, relaxed workers, and unengaged workers. Data on health complaints, however, are less clear. The authors found that among women, nonenthusiastic workaholics reported significantly more health complaints when compared to all other groups except disenchanted workers. The same was not true, however, among men, for whom nonenthusiastic workaholics reported significantly more health complaints relative to only two other worker groups (work enthusiasts and relaxed workers).

In their study of 962 Japanese businessmen from 10 private enterprises, Kanai et al. (1996) used the same set of measures used by Spence and Robbins (1992). However, they translated all scales into Japanese. Additionally, they added three scales to measure consequences of job stress. A factor analysis revealed that the workaholism scales produced only a two-factor solution instead of the intended three; as a result, they had to drop the work involvement dimension from the study. The authors indicated this was likely due to cultural differences. As a consequence, the number of worker types was limited to four, versus the six originally defined by Spence and Robbins. These four were called *enjoying work*,

Table 1
*Worker Type as Defined by Relative Scores
on the Workaholism Scales*

| Worker type | Workaholism scales | | |
|----------------------------|--------------------|------------------|-------------------|
| | Driven | Work Involvement | Enjoyment of Work |
| Nonenthusiastic workaholic | High | High | Low |
| Enthusiastic workaholic | High | High | High |
| Relaxed worker | Low | Low | High |
| Unengaged worker | Low | Low | Low |
| Work enthusiast | Low | High | High |
| Disenchanted worker | High | Low | Low |

workaholics, *work enthusiasts*, and *unengaged workers*. Kanai et al. found that workaholics reported the highest number of health complaints, but the difference was significant only when compared with two of the three other groups: unengaged workers and enjoying work. The difference between workaholics and work enthusiasts was not significant. A review of studies relating work stress and health concluded that current evidence supports only an indirect link between the work stress and health (Ganster & Schaubroeck, 1991), so the mixed findings reflect the complexity of this relationship.

Although the connection between workaholism and health is examined in the literature, researchers have not yet addressed the relationship between workaholism and overall psychological well-being. Life satisfaction and meaning in life are two recognized relevant indicators of psychological well-being (Zika & Chamberlain, 1992). According to Spence and Robbins (1992), nonenthusiastic workaholics report high job stress and low enjoyment in work, which suggests that they will experience low satisfaction in life. Because most of a workaholic's time is spent performing work tasks that are not enjoyed, much of their life is not enjoyed. Similarly, nonenthusiastic workaholics are likely to report that life does not hold much meaning for them when it is spent in nonenjoyable tasks. In contrast, enthusiastic workaholics enjoy their work. Therefore, because a high percentage of their time is spent in enjoyable tasks, they will likely find life satisfactory and a high level of meaning in their life.

On the basis of the available literature, the hypotheses of this study were as follows: (a) Nonenthusiastic workaholics have significantly higher work-life conflict, lower life satisfaction, and lower purpose in life when compared with nonworkaholics; (b) enthusiastic workaholics have significantly higher work-life conflict, higher life satisfaction, and higher purpose in life when compared to nonworkaholics; and (c) nonenthusiastic workaholics have significantly higher work-life conflict, lower life satisfaction, and lower purpose in life when compared to enthusiastic workaholics.

Method

Participants

Potential participants ($N = 503$) were randomly selected from a database for the entire population of salaried employees (approximately 4,000 people) in a large, high technology corporation located in the U.S. Midwest. Potential participants were then sent invitations to participate in a study on work-life conflict. The potential participant pool included a wide range of jobs including engineering, accounting, program/product management, marketing, pricing, purchasing, information systems, finance, human resources, and business development. A large majority of the population sampled were engineers and engineering management, and approximately 80% were men.

Of the original 503 people invited to participate, 175 (35%) employees completed surveys. Of the 175 respondents, 74% were men, 82% were married, 59% had children at home, and 21% were managers. Overall participation rate for men was 32%, whereas participation rate for women was 48%. Mean age of the sample was 39.5 years ($SD = 9.13$, range = 22–60). Respondents reported an average of 8.7 ($SD = 8.0$) years in their current line of work, with an average of 47.2 ($SD = 8.3$) hr worked per week. Ethnic identity was not gathered because the population sampled was approximately 96% White, and requesting this information could have been regarded as a threat to anonymity for non-White persons. Job function

(e.g., engineering, accounting) was also not gathered to protect anonymity. The survey responses of four participants were eliminated due to missing data on the workaholism scales, leaving 171 surveys on which data analyses were performed.

Measures

Workaholism. Classification of the participants into the worker types of nonenthusiastic workaholics, enthusiastic workaholics, work enthusiasts, relaxed workers, unengaged workers, and disenchanted workers was accomplished using the workaholism measure developed by Spence and Robbins (1992). This measure consists of three independent subscales that measure the components of the workaholic triad: (a) Driven, (b) Work Involvement, and (c) Enjoyment of Work. Each item is answered on a 5-point scale ranging from *strongly disagree* (0) to *strongly agree* (4). Item scores were summed to yield a total score for each scale. The pattern of scores used to identify each worker type is indicated in Table 1.

The Driven scale contains seven items and measures a person's internal pressures or intrinsic drive to work. Sample items include: "I often feel that there's something inside me that drives me to work hard," "I feel guilty when I take time off from work," and "It's important to me to work hard even when I don't enjoy what I'm doing." The range of scores is 0 to 28. Reported coefficient alphas range from .67 to .81 (Spence & Robbins, 1992). On the basis of the data collected for the present study, Cronbach's alpha was .73.

The Work Involvement scale consists of eight items and measures the extent to which a person devotes himself or herself to productive projects and constructive uses of time, including both job and nonjob work activities. Sample items are: "I like to use my time constructively on and off the job," "Between my job and other activities I'm involved in, I don't have much free time," and "I like to relax and enjoy myself as often as possible." The range of scores is 0 to 32. Reported coefficient alphas range from .67 to .69 (Spence & Robbins, 1992). Cronbach's alpha for the data collected in the present study was .71.

The Enjoyment of Work scale is composed of 10 items. Sample items include: "My job is so interesting that it often doesn't seem like work," "I lose track of time when I'm engaged on a project," and "Sometimes when I get up in the morning I can hardly wait to get to work." Scores range from 0 to 40. Reported coefficient alphas range from .85 to .86 (Spence & Robbins, 1992). The data collected for the present study yielded a Cronbach's alpha of .85.

As noted earlier, the workaholism scales have been used in only two published studies (Kanai et al., 1996; Spence & Robbins, 1992). During instrument development, the scales were first given to college students. Cronbach alphas, interitem correlations, and part-whole correlations were used to identify items that needed to be rewritten or dropped to improve the scales. The revised and shortened scales were administered to a new sample of students and were found to have satisfactory psychometric properties (Spence & Robbins, 1992). We also examined intercorrelations of the workaholism subscales with the authors' other measures, including measures of job stress, time commitment, job involvement, perfectionism, nondelegation, and health complaints, to provide further evidence of construct validity. In examining the relationships with the other subscales, all three workaholic scales were significantly correlated with Time Commitment and Job Involvement as expected. The Driven scale also had substantial relationships with Stress, Perfectionism, Nondelegation, and Health Complaints (r s ranged from .36 to .66). In contrast, correlations between Work Enjoyment and Perfectionism and Nondelegation were nonsignificant. For the Work Involvement scale, correlations with Stress, Perfectionism, Nondelegation, and Health Complaints were all significant, except for the correlation with Health Complaints for men.

As additional support for validity evidence, the means for the time commitment scores for work enthusiasts, nonenthusiastic workaholics, and enthusiastic workaholics were not significantly different from each other but were all significantly higher than the means for relaxed workers,

disenchanted workers, and unengaged workers (Spence & Robbins, 1992). This finding supports that both types of workaholics and work enthusiasts report more time commitment to work than other types of workers. In examining the relationship of worker types and average hours worked, results showed fewer significant differences between group scores than those for time commitment. However, a ranking of means high to low placed the scores for work enthusiasts, nonenthusiastic workaholics, and enthusiastic workaholics above the scores of other worker types. We obtained similar results in the present study wherein enthusiastic workaholics' and nonenthusiastic workaholics' average scores ranked higher than the nonworkaholic types. It should be noted that people who work long hours, such as medical residents, are not necessarily workaholics (Scott et al., 1997). Rather, it is the high drive to work and high work involvement that often predisposes the workaholic to work long hours. Additionally, work involvement differs from the more restrictive construct job involvement, in that it refers to work activities both on and off the job.

Work-life conflict. Work-life conflict was measured with the Work Interference with Family (WIF) scale used in a study by Gutek, Searle, and Klepa (1991). This scale is based on the four-item version of the interrole conflict scale developed by Kopelman, Greenhaus, and Connolly (1983) intended to measure "the extent to which a person experiences pressures within one role that are incompatible with the pressures that arise within another role" (p. 201). The two pertinent roles are the work role and the family role. Modifications made by Gutek et al. (1991) expanded the family role to encompass personal life in general, and allowed the measure to be equally appropriate for married and nonpartnered respondents. On the basis of samples of psychologists and managers participating in an executive education program (70% women), Gutek et al. reported coefficient alphas of .81 and .83. In the present study, Cronbach's alpha was .80. Gutek et al. performed a factor analysis of both their scales, WIF and Family Interference with Work (FIW), with varimax rotation, which revealed that the items for the two scales loaded on two separate factors. The items measuring the extent that work roles interfere with family roles (items of the Work-Life Conflict scale for this study) loaded on one factor, whereas the items that measured the extent that family roles interfere with work loaded on the second factor. It should be noted that in the present study the Gutek et al. modifications were used with two minor text deletions to reduce possible confusion. The deleted text appears in brackets in the item descriptions below.

Participants responded on a 5-point scale ranging from *strongly disagree* (1) to *strongly agree* (5). Higher scores indicate higher levels of perceived conflict (Gutek et al., 1991). No further guidelines for score interpretation are provided. The items are: "After work, I come home too tired to do some of the things I'd like to do," "[On the job] I have so much work to do that it takes away from my personal interests," "My family/friends dislike how often I am preoccupied with my work [while I am at home]," and "My work takes up time that I'd like to spend with family/friends."

Life satisfaction. Life satisfaction was measured using the Satisfaction With Life Scale (SWLS) developed by Diener, Emmons, Larsen, and Griffin (1985). The SWLS is considered to assess a person's global judgment of his or her life, allowing the respondent to individually weigh the different domains of life according to his or her own values. The SWLS consists of five items that are answered on a 7-point scale ranging from *strongly disagree* (1) to *strongly agree* (7). Sample items are: "I am satisfied with my life," "If I could live my life over, I would change almost nothing," and "In most ways my life is close to ideal." Total scores range from 5 to 35. In a detailed review of this instrument, Pavot and Diener (1993) stated that SWLS scores can be interpreted in absolute as well as relative terms. A score of 20 corresponds to a neutral point on the scale, indicating the respondent is about equally satisfied and dissatisfied. Computed averages for most groups range from 23 to 28, or correspondingly, "slightly satisfied" to "satisfied."

Diener et al. (1985) reported a coefficient alpha of .87 for the SWLS, with a 2-month test-retest correlation coefficient of .82. Factor analysis of

the measure yielded a single factor, which accounted for 66% of the variance. Reported interitem correlations ranged from .61 to .81. Cronbach's alpha for the present study was .87. As additional evidence of construct validity, SWLS scores have been shown to be negatively correlated with clinical measures of distress. The SWLS correlates .46 with the Life Satisfaction Index (Diener et al., 1985). SWLS scores have been shown to correlate with health and marital status, whereas SWLS scores were shown to be uncorrelated with affect intensity and impulsivity (Pavot & Diener, 1993). Although 2-month test-retest data indicate the relative short-term stability of SWLS scores, research data also provide evidence for the scale's sensitivity to life events (Pavot & Diener, 1993). In their review of the literature, Pavot and Diener noted that changes in the scores were related to good and bad events in the respondents' lives during the past year. Additionally, a group of psychotherapy clients showed significantly higher SWLS scores after receiving therapy when compared to their scores at intake. Over a 4-year interval, the test-retest coefficient dropped to .54.

Meaning in life. Meaning in life was measured with Part A of the Purpose In Life (PIL) test developed by Crumbaugh and Maholick (1964). The PIL was designed as an attitude scale to measure the degree to which a person experiences "purpose in life." The PIL consists of three parts A, B, and C, of which only Part A is objectively scored. Parts B and C are sentence completions and a paragraph response on the respondent's goals. Only Part A was used in the present study. Part A contains 20 items, which are answered on a 7-point scale, with 1 and 7 representing the extreme responses (see below) for each question and 4 representing a neutral response. Sample items are: "I am usually: (1) *completely bored* to (7) *exuberant, enthusiastic*;" "In life I have: (1) *no goals or aims at all* to (7) *very clear goals and aims*;" and "In thinking of my life, I: (1) *often wonder why I exist* to (7) *always see a reason for my being here*." A total scale score is obtained by summing item scores. Raw scores of 113 and above are interpreted to mean that the respondent has a definite purpose in life, whereas raw scores of 91 and below suggest a lack of clear meaning in life (Crumbaugh & Maholick, 1981).

Odd-even split-half reliabilities of .81 and .85 have been reported, adjusted to .90 and .92, respectively, using Spearman-Brown prophecy (Crumbaugh & Maholick, 1981). Cronbach's alpha for the present study was .90. Construct validity is supported by various comparisons of group means of different populations (Crumbaugh & Maholick, 1981). Several studies have shown a correlation of $-.30$ to $-.65$ between the Minnesota Multiphasic Personality Inventory-Depression scale and the PIL (Crumbaugh & Maholick, 1981). Significant correlations have been reported between the California Psychological Inventory (CPI) and the PIL on four of the CPI's scales measuring self-acceptance, $r = .40$; sense of well-being, $r = .52$; achievement via conformance, $r = .63$; and psychological mindedness, $r = .47$.

Procedure

The 503 randomly selected employees were sent invitations via company mail to attend a 90-min meeting. The invitation briefly identified the purpose and use of the research and clearly stated that participation was voluntary and anonymity guaranteed. Participants were told that the data would allow researchers to learn more about the impact of attitudes toward work on employees' work-life conflict and psychological well-being. Employees were told that they would fill out the study surveys anonymously, that none of the individual surveys would be shared with company management, and that results would be provided only in summary form. Participants were told they would be invited to debriefings on the results as a benefit of participation. After consent was obtained, participants completed the surveys in the meeting room and returned them in an envelope. Nearly all participants required less than a half hour to complete the survey. Meeting attendance ranged from 12 to 32 participants for each of nine meetings.

Results

Summary Statistics

Total sample means, standard deviations, and Cronbach alphas for each of the measures appear in Table 2. The alpha values ranged from .71 to .90 and are consistent with those cited in previous research. Pearson correlation matrices for all the measures appear in Table 2. Significant positive correlations are indicated between Work Involvement and Driven scales ($r = .24$); Work-Life Conflict and both the Driven ($r = .42$) and Work Involvement ($r = .20$) scales; Life Satisfaction and Work Enjoyment ($r = .37$); and Purpose in Life and both the Work Enjoyment ($r = .42$) and Life Satisfaction ($r = .53$) scales. Significant negative correlations are indicated between Life Satisfaction and Driven ($r = -.20$), Work Involvement ($r = -.20$), and Work-Life Conflict ($r = -.24$) scales and between Purpose in Life and Work-Life Conflict ($r = -.17$). We computed disattenuated correlations for the workaholism scales to yield the correlations between the true scores: $r = .33$ for Driven and Work Involvement scales, $r = .00$ for Driven and Work Enjoyment scales, and $r = .11$ for Work Involvement and Work Enjoyment scales.

We performed t tests, which revealed no significant gender differences in the means for all measures except on the Work Involvement scale ($p = .025$; $M = 16.51$, $SD = 4.17$ for women; and $M = 18.24$, $SD = 4.49$ for men). Consequently, we combined gender groups for subsequent analyses.

Classification of Participants into Worker Types

To test the hypotheses, we grouped participants into one of the six worker types identified by Spence and Robbins (1992). First, we transformed scores for each of the three workaholism scales into z scores. We classified scores above the mean (positive z scores) as "high" scores and those below the mean (negative z scores) as "low" scores. We then performed worker type classification using Spence and Robbins's defined patterns of high and low scores on the three scales (see Table 1). For example, an employee who scored above the mean on all three scales was classified as an enthusiastic workaholic. This matches the resulting pattern of mean scores Spence and Robbins defined for the workers they categorized as falling into this worker group. Likewise, workers who scored low on the Driven scale and high on both the

Work Involvement and Work Enjoyment scales were classified as work enthusiasts. The results of this classification are found in Table 3, which indicates the number of workers as well as the resulting means of the three workaholism scales for the workers classified under each worker type. Thirty-two employees had score patterns that did not match any of the six profiles as defined by Spence and Robbins. Consequently, we considered these employees nonclassifiable and excluded them from further analyses.

To determine if grouping all the nonworkaholic worker types was empirically supported for hypotheses testing, we compared the average scores of the outcome measures for the four types (work enthusiasts, unengaged workers, relaxed workers, and disenchanted workers) using one-way analyses of variance. Means of the outcome measures for each nonworkaholic worker type appear in Table 4. All F s were significant and are listed at the bottom of Table 4. We used Tukey follow-up tests for pairwise comparisons. Results indicated that three of the types (work enthusiasts, unengaged workers, and relaxed workers) did not differ from each other based on the outcome measures. However, one type, disenchanted workers, did differ significantly with one, two, or all three of the other types. When the disenchanted workers differed from the other worker types, they had higher work-life conflict and lower life satisfaction and purpose in life, as indicated in Table 4. Because of these significant differences, we removed the disenchanted worker type from the Nonworkaholic group for the subsequent hypotheses tests.

Pearson correlations between average hours worked per week and the workaholism scales revealed significant positive relationships ($r = .18$, $p < .05$ for Drivenness; $r = .17$, $p < .05$ for Work Involvement; and $r = .215$, $p < .01$ for Work Enjoyment). Cumulative frequency distributions of average hours worked per week for each worker type revealed a trend that enthusiastic workaholics and nonenthusiastic workaholics have a higher percentage of workers who work long hours than those classified as nonworkaholic types, thereby further supporting the validity of the worker types used in this study.

Hypotheses

We tested the a priori hypotheses using planned comparisons. The work enthusiasts, unengaged workers, and relaxed workers all combined into a nonworkaholic type. We provide mean scores on

Table 2
Summary Statistics, Cronbach Alphas, and Intercorrelations for Workaholism Scales and Outcome Measures

| Measure | Driven | WI | Enjoy | WLC | LS | PIL | <i>M</i> | <i>SD</i> | Range |
|---------|--------|-------|-------|-------|--------|-------|----------|-----------|--------|
| Driven | .73 | .24** | .00 | .42** | -.20** | -.08 | 18.91 | 3.79 | 0-28 |
| WI | | .71 | .08 | .20** | -.20** | .03 | 17.78 | 4.46 | 0-32 |
| Enjoy | | | .85 | -.14 | .37** | .42** | 20.68 | 5.92 | 0-40 |
| WLC | | | | .80 | -.24** | -.17* | 13.05 | 3.47 | 4-20 |
| LS | | | | | .87 | .53** | 21.49 | 6.43 | 5-35 |
| PIL | | | | | | .90 | 107.23 | 13.54 | 20-140 |

Note. $N = 171$. Data on the diagonal represent Cronbach alphas for this study. WI = Work Involvement scale; Enjoy = Enjoyment of Work scale; WLC = Work-Life Conflict scale; LS = Life Satisfaction scale; PIL = Purpose in Life scale.

* $p < .05$, two-tailed. ** $p < .01$, two-tailed.

Table 3
*Number of Workers Per Type, Percentage of Sample, and Mean z Scores
 for Workaholism Scales*

| Worker type | n (%) | Workaholism scales | | |
|----------------------------|---------|--------------------|--------|----------------|
| | | Work Involvement | Driven | Work Enjoyment |
| Enthusiastic workaholic | 37 (22) | 0.733 | 0.743 | 0.866 |
| Nonenthusiastic workaholic | 23 (14) | 1.013 | 0.745 | -0.936 |
| Work enthusiast | 14 (8) | 0.833 | -0.900 | 0.814 |
| Unengaged worker | 18 (11) | -0.860 | -0.870 | -0.743 |
| Relaxed worker | 23 (14) | -1.072 | -1.020 | 0.597 |
| Disenchanted worker | 24 (14) | -0.801 | 0.583 | -0.965 |
| Unclassified | 32 (19) | | | |

the three outcome measures for the enthusiastic workaholics, non-enthusiastic workaholics, and nonworkaholics in Table 5. Significant results of paired comparison *t* tests are also indicated in the table. We found nonenthusiastic workaholics to have significantly more work-life conflict and significantly less life satisfaction and purpose in life than nonworkaholics. Additionally, we found enthusiastic workaholics to have significantly more life satisfaction and purpose in life than nonenthusiastic workaholics and significantly more work-life conflict than nonworkaholics. Enthusiastic workaholics and nonenthusiastic workaholics did not differ in work-life conflict, as expected.

Discussion

Percentages of worker types classified into each group were very similar to those reported by Spence and Robbins (1992). Percentages for either type of workaholics (enthusiastic workaholics and nonenthusiastic workaholics) were essentially the same for both samples; however, we observed small differences in the nonworkaholic types. The present study found slightly lower percentages of unengaged and relaxed workers and a slightly higher percentage of disenchanted workers. Approximately the same number of workers remained unclassified for both studies. This suggests that percentages of these types of workers may be somewhat stable among different white-collar occupations in relatively large organizations (universities and corporations). Future

research should continue to explore differential workaholism rates in various occupations and types of organizations.

The hypotheses regarding the predicted differences between nonenthusiastic workaholics and nonworkaholics received strong support. We found nonenthusiastic workaholics to have significantly poorer outcomes on all the measured outcome variables: work-life conflict, life satisfaction, and purpose in life. It would appear from self-reports that nonenthusiastic workaholics likely experience a lower quality of life when compared to their nonworkaholic peers. Until now, counselors and therapists had to rely on their intuition or the assumption that workaholism is associated with negative psychological outcomes.

The present study indicates that the disenchanted worker is also associated with poorer psychological outcomes when compared to other nonworkaholic types (see Table 4). The disenchanted worker shares the characteristics of a high drive to work and low enjoyment of work with the nonenthusiastic workaholic. Therefore, researchers can use assessment in practice for high drive to work coupled with low enjoyment of work to identify workers who may be at high risk for work-life conflict and other associated negative outcomes. Further research should include the disenchanted worker as a point of focus to increase the understanding of this worker type as a target for potential interventions.

The hypotheses regarding the differences between enthusiastic workaholics and nonworkaholics were supported only for work-

Table 4
Means (and Standard Deviations) of Outcome Measures for the Nonworkaholic Worker Types

| Worker type | Outcome measures in scale scores | | |
|---------------------|----------------------------------|---------------------------------|---------------------------------|
| | Work-Life Conflict | Life Satisfaction | Purpose in Life |
| Work enthusiast | 10.64 (2.76) _a | 23.50 (6.21) _{a,b} | 113.43 (11.55) _a |
| Unengaged worker | 10.78 (2.80) _a | 21.72 (6.68) _{a,b} | 108.88 (10.27) _{a,b} |
| Relaxed worker | 11.00 (3.15) _a | 25.96 (3.48) _a | 111.61 (7.01) _a |
| Disenchanted worker | 14.13 (3.08) _b | 19.33 (6.36) _b | 98.83 (15.89) _b |
| | $F(3, 78) = 6.80$ $p < .001$ | $F(3, 78) = 5.49$ $p = .002$ | $F(3, 78) = 6.52$ $p = .001$ |

Note. *p* values given are nominal. Groups with scores that do not differ significantly are given the same subscript. A Bonferroni correction was used with a *p* value of .05 correcting for six tests. Consequently, a *p* value of less than .0083 is needed to reach statistical significance.

Table 5
Means of Each Group and Results of Between Group t Tests on Outcome Measures

| Worker group | Work-Life Conflict | Life Satisfaction | Purpose in Life |
|-----------------------------|---------------------|---------------------|----------------------|
| Nonenthusiastic workaholics | 14.565 _a | 16.435 _a | 101.044 _a |
| Enthusiastic workaholics | 14.513 _a | 22.162 _b | 110.730 _b |
| Nonworkaholics ^a | 10.836 _b | 23.946 _b | 111.179 _b |

Note. Groups with scores that do not differ significantly are given the same subscript. A Bonferroni correction was used with a single-tailed *p* value of .05 correcting for three tests. Consequently, a *p* value of less than .016 is needed to reach statistical significance.

^a Nonworkaholics group included the work enthusiasts, relaxed workers, and unengaged workers.

life conflict. Means for life satisfaction and purpose in life were not statistically different for enthusiastic workaholics and nonworkaholics. Enthusiastic workaholics reported more work-life conflict than their nonworkaholic counterparts; however, they appeared to experience similar levels of purpose in life and life satisfaction. This indicates that a high drivenness to work and high enjoyment of work, manifested in high work involvement, does not lead to higher life satisfaction or sense of purpose in life as predicted. One interpretation is that a lack of life balance may be a mediating factor, limiting higher scores on these outcomes. Even though these individuals are enjoying the work in which they are highly involved, this high work involvement is related to work-life conflict, which may be preventing them from achieving higher life satisfaction and purpose in life. This provides evidence for the intuitively held belief that life balance is an important factor for individuals. Brown's (1996) values-based, holistic model of career and life satisfaction postulates that life roles interact in characteristic ways, including producing interrole conflicts, which occur when time in one role interferes with spending sufficient time in another role. O'Driscoll, Ilgen, and Hildreth (1992) found that job time demands resulted in interrole conflict with life roles. More interestingly, they found an asymmetrical relationship of on-job and off-job time demands. Specifically, "greater involvement in off-job activities was associated with reduced, rather than increased role interference and psychological strain" (p. 277). The present study suggests that a potential intervention for enthusiastic workaholics is to help them become more involved with off-job activities, which would help maintain balance. Because it may be difficult to get them to work fewer hours (because they enjoy working), better involvement/strategic use of their off-job hours could achieve the implied reduced psychological strain. This is a "work hard, play hard" strategy, rather than a "work less" strategy. Brown (1996) concluded that investigators need to study interaction of life roles from a holistic perspective. The results of this study support this idea and echo his call for further study.

Finally, the analyses show strong support for differences between nonenthusiastic workaholics and enthusiastic workaholics on measures of purpose in life and life satisfaction. This justifies the continued distinction between the two types of workaholics as critical for further workaholism research. Studies using measures that fail to discriminate the two types will likely confound research in this area and limit the generalizations that can be drawn. The

differences in the criterion measure scores for these two worker types highlight the apparent importance of enjoyment of work on outcomes. Employees with high drive to work who scored relatively low in their enjoyment of work (nonenthusiastic workaholics and disenchanted workers) expressed the lowest life satisfaction and sense of purpose in life of all the identified worker types.

The significantly higher work-life conflict reported for both types of workaholics suggests that workaholism in any form is associated with higher conflict with the workaholic's home life. Therefore, both types of workaholics and the disenchanted worker may seek counseling for stress associated with work-life conflict. When this conflict exists for a given client, the counselor may need to determine if the client is a workaholic and if so, which type. Strategies for intervention may need to be different for each type. As already indicated, interventions for enthusiastic workaholics could include increased involvement in nonwork activities to address life balance plus stress management techniques to eliminate or help neutralize the high job stress. For nonenthusiastic workaholics and disenchanted workers, although stress management may be helpful, the data suggest that counseling strategies or approaches to increase these individuals' enjoyment of work may best serve to increase their overall well-being. This could include exploration of existential concerns to help the client develop a clearer purpose in life. Career counselors who detect high drive to work in any client may do well to encourage such clients to find work that they enjoy or work that is highly meaningful to them rather than focusing on other job values such as prestige or salary. Individuals with such high drive may more than make up for any salary differences because of the success that their high motivation and dedication will likely bring them.

Unfortunately, as Savickas (1996) noted, "Drives have been largely ignored in vocational theory, with the notable exception of Bordin's (1990) important work" (p. 197). However, even Bordin's theory was recently dropped from Brown, Brooks, and Associates' third edition of their text on career theory (Brown, Brooks, & Associates, 1996). Perhaps Bordin's theory deserves renewed research interest based on the implications of these findings.

From a counseling or applied perspective, there is a need to integrate the components of the workaholic triad, especially drive to work and enjoyment of work, into theories or models of career choice and adjustment. Research exploring the rigidity or flexibility of these workaholic traits would be a sensible next step to support career adjustment needs. Research to identify effective methods and counseling approaches in treating workaholics is also clearly needed.

Limitations of this study warrant attention. Even though the participant pool was randomly drawn from a large population of employees, we selected participants from a single organization. As such, worker type distribution may be a reflection of that company's particular work culture. However, the similarity in distribution of worker types to those cited by Spence and Robbins (1992) for their sample suggests that the work culture may not have been particularly unique. Future studies should stratify samples across several organizations.

Self-selection may have led to response bias. The advertised focus of the study, work-life conflict, may have weighted the pool of participants toward those who were experiencing work-life

conflict problems. This, in turn, may have increased the participation rate of both kinds of workaholics such that the sample reflects a higher percentage of workaholics than what would be found in the general workplace population. However, some of the invited employees called or sent e-mail to the researcher saying they did not have the time to participate in the study because doing so would lead to more work-life conflict. So, in some cases, high levels of work-life conflict may have inhibited participation. Also, 40% of the respondents' scores indicated that they did not feel work-life conflict was a problem for them. Response rate was relatively low (35%), even though workers were allowed to complete the surveys on company time. Future researchers may have to find more creative ways to increase participation within a given population.

This sample contained high percentages of engineers and male participants, which may have distorted the worker findings. The similarity in reported percentages of worker types with previous research (Spence & Robbins, 1992) suggests this was not a serious problem for this sample, or that both studies are similarly flawed. This also highlights the need for validation with additional samples and various occupations. Additionally, the effect of environmental factors, such as jobs that demand individuals to work many hours (e.g., medical residents), needs to be examined.

The relatively low number of women participants in this study may have masked subtle gender differences. Future research should continue to evaluate gender differences. Additionally, it is possible that women and men may experience workaholism and its consequences differently. Commitment to excessive work hours may signify something very different for women responsible for children and home than for men without these responsibilities.

The measures used in this study all involved self-report. Problems or distortions with individuals' levels of self-awareness or self-reporting behaviors could have compromised results. One potential aspect of this problem worth noting is that workaholics, as a narrower group, may have consistently differing personality traits when compared to nonworkaholics that may have systematically affected their self-reporting accuracy. However, workaholics' perfectionism tendencies suggest that workaholics would attempt to report as accurately as they are able to discern about themselves.

Finally, the negative outcomes found to exist for workaholics, including higher job stress, health complaints (Spence & Robbins, 1992), and work-life conflict, as well as lower scores on measures that are related to psychological well-being, suggest that differences in other outcomes that are important to therapists and employers may also exist. These outcomes may include burnout, productivity, and time management behaviors, which may be potential targets for intervention strategies.

In conclusion, this study suggests that nonenthusiastic workaholics experience more work-life conflict, less life satisfaction, and less purpose in life when compared with most other nonworkaholic types. The nature of the constructs involved in defining workaholism, enjoyment of work, and work involvement in particular also indicate that workaholism has implications for career counseling and that further research exploring these implications is warranted.

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The Publications and Communications Board has opened nominations for the editorships of *Journal of Applied Psychology*, *Journal of Consulting and Clinical Psychology*, *Journal of Educational Psychology*, *Psychological Bulletin*, and *Journal of Personality and Social Psychology: Interpersonal Relations and Group Processes* for the years 2003–2008. Kevin R. Murphy, PhD, Philip C. Kendall, PhD, Michael Pressley, PhD, Nancy Eisenberg, PhD, and Chester A. Insko, PhD, respectively, are the incumbent editors.

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