

# OCCUPATIONAL INTEREST PATTERNS AND PERSONALITY STYLES OF FRESHMAN STUDENT-ATHLETES

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## ABSTRACT

The existence and relationship of common personality styles and occupational orientations were explored. Student-athletes and non-athletes enrolled in a freshman seminar completed the Personality Adjective Check List and the Strong Interest Inventory. The results suggest that student-athletes and non-athletes differ on several personality and occupational variables and that personality style has an important relationship to occupational orientation and interests. Implications for athletic counseling professionals are discussed.

## INTRODUCTION

One of the most important developmental tasks college students face is that of establishing their personal identities (Chickering, 1975). While there are many ways and sources from which identity is derived, a primary way in which identity is established is through the choice of careers. Casual observation of interpersonal interactions will bear this out. One of the most common and powerful ways which people use to identify themselves to others is through sharing their work roles or, in the case of college students, academic majors. It is rare to hear people describe themselves without reference to the work they do (or do not do, as in the case of the unemployed) or to the major they are pursuing. This information provides the basis for many interactions and relationships.

Choices made in regard to careers and majors also often provide considerable information about the personality of the individual in question (Holland, 1973). Therefore, it is clear that the task of choosing majors and careers has psychological as well as vocational implications. Directed efforts, such as career counseling, have been shown to enhance psychological functioning in college students uncertain about their future academic and vocational plans (Denson, 1992a).

Student-athletes represent a special population facing a unique set of demands during their college years (Jordan & Denson, 1990). Like other students, they face significant academic, personal, and social challenges. For student-athletes, however, these developmental challenges must be addressed in the context of participating in intercollegiate athletics. Several authors have suggested that participation in intercollegiate sports may preclude participation in activities that foster the development of viable vocational plans (Kennedy & Dimick, 1987; Pinkerton, Hinz, & Barrow, 1989). Student-athletes may, in the process of participating in athletics, prematurely foreclose other identity and role options outside of sport (Petitpas, Danish, McKelvain, & Murphy, 1992). They may anticipate a career in professional sport, despite the enormous odds against attaining that goal (McGowan, 1992). Undoubtedly, many believe they will be the exception and make it in professional sports. For student-athletes fitting these descriptions, there appears to be little effort directed toward career development. Student-athletes appear to be at increased risk of lagging in their career development unless special attention is directed toward the career development process.

### CAREER DEVELOPMENT MODEL

It is possible to divide the career development process into four stages: (1) self-assessment of interests, values, and dependable skills; (2) researching vocational options; (3) experiential learning; and (4) decision-making and implementing choices. The first—and perhaps most important—step in this process is self-assessment of interests, values, and dependable skills. In a sense, the self-assessment process requires an examination and understanding of the individual's personality and how it best fits into the world of work. Without such an understanding of the relationship between personality style and occupational demands, there may be an increased likelihood of making an inappropriate choice. Occupational instability and psychological distress may be two likely consequences of inappropriate career choices.

Holland's (1973) vocational theory views vocational choices as expressions of personality. In this theory, Holland identifies six primary types by which people and occupations can be categorized: Realistic, Investigative, Artistic, Social, Enterprising, and Conventional. Holland's model essentially seeks to maximize the congruence between the personality of the individual and the "personality" of the job. In such maximization lie the most appropriate and satisfying vocational choices.

### PERSONALITY STYLES

While Holland's (1973) model was not specifically developed as a personality theory, it is extremely useful because of the way it links vocational interests and personality type. Alternatively, Millon (1981, 1990) has developed a theory of personality that may have vocational applications and may be particularly useful for understanding student-athletes. In Millon's model, eight basic personality types are derived using three polarities.

#### Polarity Model of Personality

According to Millon, people may be oriented toward either end of an Active-Passive polarity, such that they generally seek to influence their environment and obtain its rewards (active), or they passively react to their environment and await the rewards bestowed by it (passive). The second polarity is Self-Other. In this polarity, people orient themselves toward self-preservation and the fulfillment of their own wishes and needs (self-orientation), or they seek primarily to nurture others (other-orientation). The final polarity is Dependent-Independent. Here people are seen as relying on others to provide rewards (dependent), or they provide their own rewards (independent). This polarity also offers two other possibilities. People may vacillate between dependence and independence (ambivalent), or they may be generally unresponsive to stimulation and reward (detached).

Millon's theoretical model was developed using pathological populations, which limits its direct utility for describing normal people. Strack (1987, 1991) has taken Millon's general conceptual framework and modified it for normal populations, resulting in the Personality Adjective Check List (PACL).

#### Descriptions of Normal Personality Types

Strack (1991) uses Millon's framework to derive eight basic personality types found in normal populations: Introversive, Inhibited, Cooperative, Sociable, Confident, Forceful, Respectful, and Sensitive. High scores on the Introversive scale of the PACL describe people who prefer distant, limited involvement with others and who work quietly and unobtrusively on the job. Others see them as calm, steady, and reliable. In contrast, the Inhibited scale describes people who also withdraw socially but do so because of fear and anxiety about negative outcomes, rather than because of disinterest. They are sensitive, shy, and difficult to get to know. Vocationally, they are most at ease working alone or with a small group they know well.

The Cooperative and Sociable scales describe people desiring considerable attention and affection. They differ in their approach to obtaining the desired reaction. Cooperative types adapt their behavior and are willing to live according to the mandates of others. They are reliable and considerate and are most at ease when relying on others. They make excellent "team players"

and thrive in work situations in which guidance, structure, and direction are abundant. Conversely, the Sociable type seizes the initiative. This personality is characterized by an outgoing, talkative, dramatic behavioral style. At times, however, Sociable people may appear fickle, superficial, and moody. Easily bored, they constantly seek excitement and novelty. Occupationally, they do well in environments that reward a flashy style and ones in which they can interact with the public and motivate others.

The Confident personality is self-reliant and egocentric and possesses strong senses of entitlement and uniqueness. These people are, however, at times seen as unempathic and insensitive to others. The confident exterior may cover feelings of inadequacy and vulnerability. In the world of work, their self-assurance, charm, and boldness often result in leadership positions. Conversely, the Forceful personality lacks the internalized sense of self-importance; thus, these people often appear driven to prove themselves. They are strong-willed, competitive, and ambitious. They tend to do well in work settings that capitalize on their ability to take control or work independently. However, they may at times demand as much of others as they do themselves, which is potentially problematic.

Respectful personalities are conservative, responsible, industrious, and highly conscious of protocol and authority. They uphold rules and regulations and may be seen by others as formal, perfectionistic, and at times judgmental. In work situations they are hardworking, reliable, and well-organized. High scorers on the Sensitive scale are unconventional and moody and have fluctuating attitudes and interests. Others may see them as dissatisfied, distracted, anxious, and inconsistent. Careers in which independence, creativity, and spontaneity are valued suit them well.

## PURPOSE OF THE STUDY

Student-athletes face many pressures and demands for academic and athletic performance. The time demands of these endeavors often detract from the career development process, yet that process is equally, if not more, important for student-athletes than for non-athletic students (Denson, 1992b; McGowan, 1992). Given the severe limitations upon the available time of student-athletes, professionals involved in counseling them must help student-athletes enhance the quality of vocational choices and do so as efficiently as possible. Understanding the relationships between personality style and vocational interests is critical to achieving this goal.

Following Holland's (1973) theoretical view of vocational choice as an expression of personality style, and the related idea that occupations and activities attract individuals sharing personality characteristics, it may be reasonable to assume that the athletic environment also attracts people with personality characteristics in common. Millon's theory (1981, 1990) as implemented by Strack (1991) provides an independent means of identifying the personality styles of student-athletes. The existence of common personality

styles also suggests that certain occupational environments and choices may provide more suitable and congruent options than others. If such a relationship exists, then the benefit for athletic counseling professionals is that they can use the information to help student-athletes make the most appropriate choices of major and career.

The primary purpose of this investigation was to explore the occupational interest patterns and personality styles of freshman student-athletes and to examine the relationship between personality style and occupational orientation. The four primary questions addressed in this study were as follows: (1) Is there a common personality type or pattern among student-athletes? (2) Are there common occupational interests among student-athletes? (3) Are personality styles associated with occupational interests? (4) Are there differences between student-athletes and non-athletes in terms of occupational orientation or personality type?

## METHOD

### Participants

Participants were freshman undergraduate students ( $N = 53$ ) at a mid-sized Atlantic region university competing in NCAA Division I. The participants were enrolled in the four sections of a freshman seminar. The seminar was a required course for freshman physical education majors and freshman student-athletes. Two of the course sections were comprised primarily of intercollegiate student-athletes, and the remaining two sections consisted primarily of non-athletes majoring in physical education. The sample was 63% male. The student-athlete group contained 36 members, of whom 25 were male. The student-athletes in the sample were participants in intercollegiate basketball, football, baseball, softball, field hockey, lacrosse, cross country, and soccer.

### Measures

Two measures were used in this study. The Personality Adjective Check List (Strack, 1991) served as the measure of personality style, and the Strong Interest Inventory (SII; Hansen & Campbell, 1985) was used to assess vocational interests and orientation.

**Personality Adjective Check List.** The Personality Adjective Check list is a 150-item list of adjectives that describe various characteristics of normal personalities. Respondents simply endorse only those items that are self-descriptive. The PACL is based on Millon's interpersonal and biopsychosocial theory (1981, 1990); however, unlike the Millon inventories, the PACL was designed for use with normal populations and is not designed to assess psychopathology. The PACL posits eight normal personality style variants of the Millon patterns and the Diagnostic and Statistical Manual-Revised (DSM-

III-R) personality disorders (American Psychological Association, 1987). For comparative purposes, these classifications are presented in Table I. The PACL demonstrates good stability of scores for both men and women. Test/re-test reliability at three months revealed a median coefficient of .71 for men and .74 for women. For men and women combined (again at three months), scale reliability coefficients ranged from .63 to .86 (Strack, 1991).

Table 1

Comparison of Polarities with DSM-III-R, Millon, and PACL Personality Types

Polarity	DSM-III-R	Millon	PACL
Passive-Detached	Schizoid	Asocial	Introversive
Active-Detached	Avoidant	Withdrawn	Inhibited
Passive-Dependent	Dependent	Submissive	Cooperative
Active-Dependent	Histrionic	Gregarious	Sociable
Passive-Independent	Narcissistic	Egotistic	Confident
Active-Independent	Antisocial	Aggressive	Forceful
Passive-Ambivalent	Compulsive	Conforming	Respectful
Active-Ambivalent	Passive-Aggressive	Negativistic	Sensitive

**Strong Interest Inventory.** The Strong Interest Inventory is a widely used measure that facilitates the identification of salient vocational interests. The SII is a 325-item inventory in which respondents indicate their interest in a wide range of occupations, occupational activities, leisure activities, academic subjects, and types of people. Respondents indicate "like," "indifferent," or "dislike" for each item.

Three main sets of scores are generated: General Occupational Themes, Basic Interest Scales, and Occupational Scales. The six General Occupational Themes—Realistic, Investigative, Artistic, Social, Enterprising, and Conventional—reflect the respondent's overall occupational orientation. The Basic Interest Scales report consistency of interests in specific subareas of the six general themes. The first two sets of scores represent interest in various activities, while the Occupational Scales assess the degree of similarity in responses made by the respondent and those made by people employed in the occupation being assessed. The SII possesses high reliability and validity. The psychometric properties of the SII and descriptions of the General Occupational Themes are fully described in Hansen and Campbell (1985).

**Procedure**

The PACL and SII were administered during the middle of the semester and took approximately one hour to complete. The PACL was completed during a class period, and the SII was completed on computer at the university's counseling center. Following completion and scoring of the two measures, a group interpretation of the meaning of the various profiles and scales was made during class. Participants with questions about their results were encouraged to meet individually with the course instructors.

**Analyses**

For purposes of the present study, only the General Occupational Theme scores and the Basic Interest Scale scores were included from the SII in the final analyses. All PACL scale scores were included in the final analyses. T-tests were performed to compare student-athletes/non-athletes and males/females on individual scale means. However, only student-athlete/non-athlete comparisons are reported. Pearson product moment correlations were generated for the SII and PACL scales—both across the entire sample and for the student-athlete and non-athlete groups—to address the questions pertaining to the relationship of personality and occupational interests.

**RESULTS**

**Student-Athletes Versus Non-Athletes**

Student-athletes and non-athletes differed significantly on a number of variables on the PACL and SII. On the PACL, student-athletes were more Respectful ( $t(51) = 2.53, p = .015$ ) and less Confident ( $t(51) = 2.52, p = .015$ ) than the non-athletes. On the SII, student-athletes and non-athletes differed significantly only on measures relating to the arts. Student-athletes were less interested in Music/Dramatics ( $t(51) = -2.96, p = .005$ ) and scored lower on the Artistic theme ( $t(51) = -2.04, p = .047$ ). Means for the PACL and SII scales are presented in Table 2.

Table 2

Mean Scores of Personality Adjective Check List and Strong Interest Inventory Scales

Scale	Athletes		Non-Athletes	
	M	SD	M	SD
Personality Adjective Check List				
Introversive	47.31	6.72	47.29	9.09
Inhibited	48.75	7.47	44.76	8.26
Cooperative	49.64	9.05	44.76	10.08

Table 2 (continued)

Scale	Athletes		Non-Athletes	
	<u>M</u>	<u>SD</u>	<u>M</u>	<u>SD</u>
Personality Adjective Check List				
Sociable	51.86	7.82	54.29	8.96
Confident*	47.64	6.41	53.12	9.18
Forceful	55.81	8.39	57.29	8.71
Respectful*	49.25	7.96	43.29	8.08
Sensitive	51.42	7.15	49.47	11.34
Strong Interest Inventory				
Realistic	42.14	10.03	42.35	9.19
Investigative	40.03	7.42	41.53	7.81
Artistic**	37.28	9.51	42.71	7.95
Social	48.64	9.52	51.94	8.68
Enterprising	47.92	10.44	49.00	8.99
Conventional	45.00	10.83	46.00	9.48
Agriculture	48.28	7.55	48.53	4.94
Nature	39.78	9.85	42.06	8.94
Adventure	58.14	8.94	58.82	7.40
Military Activities	47.86	9.47	48.41	9.95
Mechanical Activities	43.30	9.57	43.71	9.49
Science	40.47	6.50	40.53	6.67
Mathematics	47.14	10.08	49.53	10.63
Medical Science	43.69	9.34	44.53	7.08
Medical Service	47.58	7.60	49.35	8.15
Music/Dramatics**	37.86	7.76	44.35	6.75
Art	40.22	10.29	44.65	8.51
Writing	37.72	8.65	39.65	6.20
Teaching	48.22	10.02	52.88	10.79
Social Service	50.19	9.85	50.82	9.82
Athletics	61.56	7.23	63.94	3.61
Domestic Arts	46.61	9.72	49.12	6.55
Religious Activities	42.42	8.60	43.47	5.59
Public Speaking	42.81	8.39	45.65	9.33
Law/Politics	44.50	8.96	43.65	10.76

Table 2 (continued)

Scale	Athletes		Non-Athletes	
	<u>M</u>	<u>SD</u>	<u>M</u>	<u>SD</u>
Personality Adjective Check List				
Merchandising	47.42	8.93	46.82	8.13
Sales	52.31	10.25	52.29	8.19
Business Management	44.56	9.27	45.71	9.72
Office Practices	45.22	7.44	45.76	6.51

Note. Athlete  $n = 36$ . Non-Athlete  $n = 17$ .

\*Means are significantly different at  $p < .05$ .

\*\*Means are significantly different at  $p < .01$ .

### Personality and Occupational Patterns

**Sample Correlations.** Several Pearson product moment correlations generated across the entire sample were significant. The PACL's Introversive personality type was significantly negatively correlated with the SII's Social occupational theme ( $r = -.27$ ,  $p = .046$ ) and several basic interest scales. It was negatively correlated with interest in Public Speaking ( $r = -.33$ ,  $p = .015$ ), Law/Politics ( $r = -.38$ ,  $p = .004$ ), Sales ( $r = -.28$ ,  $p = .037$ ), and Business Management ( $r = -.34$ ,  $p = .011$ ). For the Inhibited personality, significant negative relationships were found with interest in Law/Politics ( $r = -.30$ ,  $p = .024$ ) and Sales ( $r = -.32$ ,  $p = .026$ ).

Interestingly, while no relationships were found involving the Cooperative personality, the Social personality was positively correlated with orientation toward the Artistic occupational theme ( $r = .32$ ,  $p = .018$ ) and interest in Medical Science ( $r = .36$ ,  $p = .008$ ) and Music/Dramatics ( $r = .32$ ,  $p = .019$ ).

A positive correlation was found between the Confident personality and orientation toward the Artistic occupational theme ( $r = .32$ ,  $p = .02$ ). The Confident personality was also positively correlated with interest in Writing ( $r = .34$ ,  $p = .012$ ), Music/Dramatics ( $r = .29$ ,  $p = .032$ ) and Public Speaking ( $r = .35$ ,  $p = .011$ ). The only significant correlation involving the Forceful personality was with interest in Military Activities ( $r = .37$ ,  $p = .006$ ).

The Respectful personality type was significantly correlated with orientation toward the Social occupational theme ( $r = .30$ ,  $p = .026$ ) and interest in Teaching ( $r = .29$ ,  $p = .036$ ) and Social Service ( $r = .30$ ,  $p = .026$ ). No significant relationships involving the Sensitive personality type were found.

**Student-Athlete Group Correlations.** Pearson product moment correlations were generated separately for the student-athlete group. Among the student-athletes, no significant relationships involving the Introversive,

Cooperative, Sociable, or Forceful personalities were found. However, the Inhibited personality negatively correlated with interest in Law/Politics ( $r = -.34$ ,  $p = .040$ ) and Sales ( $r = -.34$ ,  $p = .040$ ) for the student-athlete group. Significant correlations were also found between the Respectful personality and the Social occupational orientation ( $r = .42$ ,  $p = .011$ ), interest in Teaching ( $r = .38$ ,  $p = .023$ ), and interest in Social Service ( $r = .35$ ,  $p = .034$ ). These results are consistent with the findings for the whole sample. Among student-athletes, the Sensitive personality was significantly correlated with interest in Teaching ( $r = .37$ ,  $p = .045$ ).

## DISCUSSION

### Student-Athletes Versus Non-Athletes

The first question this study explored was whether or not there were differences in the personality styles and occupational orientations of student-athletes and non-athletes. The results of the study suggest that student-athletes and non-athletes show some modest differences in personality styles and occupational interest patterns. One particularly interesting finding was that student-athletes scored lower on the Confident personality scale. This result seemed counterintuitive to the authors since it is commonly assumed that student-athletes possess higher than average confidence. One possible explanation for this counterintuitive finding is that non-athletes may be making their judgments (on items relating to confidence) by comparing themselves only to other freshmen. Student-athletes, on the other hand, may be comparing themselves to upperclass student-athletes and receive feedback from coaches based on the standards established by the upperclass group. As a result, they come up short. This finding suggests that counselors who work with freshman student-athletes may wish to pay particular attention to issues such as confidence and self-esteem in their clientele.

That student-athletes were more Respectful was not surprising since they have been socialized to follow the orders of coaches without questioning. This effect may have been magnified by the awe factor. As freshmen, it is likely that many of the student-athletes might be in awe of their coaches and would be particularly reluctant to disobey or disregard them. This effect might be expected to diminish over time. While the Respectful style does not generally pose problems, in extremes it may indicate a student-athlete who is unwilling to question and challenge the status quo when that might be warranted in personal, academic, and occupational situations. Counselors should be aware of this possibility, especially in terms of the student-athlete's career interests and the nature of the counseling relationship and particularly if a student-athlete is expecting to be told which direction to pursue.

The finding that student-athletes were less interested in artistic endeavors is not surprising. Time that others might devote to artistic pursuits is more than likely devoted to athletic activities. The demands of college probably

serve to eliminate any possibility of artistic pursuits. Furthermore, the Respectful personality may not lend itself to artistic endeavors.

One likely reason that the present findings did not show more and greater differences between the student-athlete and non-athlete groups is that the non-athletes were Physical Education majors. Clearly this group has greater than average interest in and connection with the athletic world. It is likely that many (if not most) were less than a year removed from competing as high school varsity athletes. In that sense, the student-athlete/non-athlete distinction may be rather hazy. If this is the case, then it might be expected that differences between these two groups might become magnified over time. The findings do point out that participants in intercollegiate athletics tend to develop a different "culture." Future research along this line may benefit from a longitudinal approach as well as using a comparison group that contrasts more with the athletic group.

### Personality and Occupational Patterns

The second major issue this study addressed was the relationship between personality type and occupational orientation. Here the correlational analyses provide considerable information of interest. For the sample as a whole, the Introversive and Inhibited personality types tended not to be interested in activities that would generally be of an enterprising nature. This suggests that, for students who are more withdrawn (whether they are student-athletes or non-athletes), some careers in business and law may not be optimal choices. Ironically, business-related careers are often seen as highly desirable and are frequently the goals of student-athletes. The findings of this study suggest that the role of personality style needs to be carefully considered with student-athletes before they make a commitment to these fields.

Results of this study suggest that, in general, high scorers on the Sociable personality type scale may wish to explore careers in the arts and in medical science. It is somewhat surprising that this personality type did not correlate significantly with interests in the Enterprising theme. The reason for the significant correlation with Medical Science, rather than Medical Service, is also unclear. Medical Science emphasizes investigation (e.g., medical research), whereas in Medical Service the emphasis is on interpersonal interaction in medically-related settings (e.g., nursing). Confident personalities appear to be interested in the arts and in public speaking, a finding that makes intuitive sense. Artistically-oriented and Confident types appear to have considerable faith in their abilities to function independently and without excessive concern about public pressure. The relationship between the Forceful personality and interest in Military Activities seems intuitively plausible. Careers capitalizing on this interest may be ideal for Forceful types. It should be noted, however, that within the student-athlete subsample neither the Confident-Artistic nor the Forceful-Military Activities relationships held. The reasons for this are unclear and will need to be addressed in future research.

The Respectful personality was significantly correlated with orientation toward the Social occupational theme in general, and with interests in Teaching and Social Service in particular. This relationship held for the general sample as well as the student-athlete subsample. The relationship may be explained by the adherence to rules, protocol, and lines of authority valued by the Respectful type. The classroom (or playing field, for those interested in coaching as well as teaching) and many social service careers are fairly well structured and have clear lines of authority and rules. Counselors may wish to encourage Respectful types to consider careers in these fields if they have not already done so.

The absence of any significant correlations for the general sample involving the Sensitive personality and occupational interests was somewhat surprising. It was expected that these types might gravitate toward the arts. However, if the erratic nature of Sensitive personalities is considered, then it might well be imagined that they would not have consistent occupational interests. Interestingly, among student-athletes the Sensitive personality was associated with an interest in Teaching. The reasons for this finding are unclear and require further study, but it is possible that teaching affords some creativity and a degree of independence from direct, immediate supervision—both characteristics that may appeal to Sensitive types.

## CONCLUSIONS

The results of this study have several important implications for professionals involved in counseling college student-athletes. First, it appears that there are personality variables that must be recognized and accounted for in counseling student-athletes. These variables may distinguish them from other students. Although the profile of a typical student-athlete did not clearly emerge, there appears to be justification for the use of personality measures to help identify an individual student-athlete's personality style. Second, by identifying the personality type, it appears possible to help student-athletes make more informed judgments about which careers may be most suitable for them. It should be clearly understood that this suggestion does not imply that student-athletes should be stereotyped or herded into any particular career. Rather, it is suggested that counselors use this information to encourage the exploration of careers that may be consistent with each student-athlete's personality style.

While the results are informative, this study represents a first step along this line of inquiry, and as such there are several limitations which must be acknowledged. It would be desirable to have a larger sample and a comparison group of non-athletes that is more distinct and heterogeneous than the one employed. It would also be important to study an upperclass sample to determine if the relationships between personality style and occupational orientation are stable and consistent over time. The possibility of differences along gender lines needs to be explored. It would also be informative to include participants in individual sports in the student-athlete sample. Finally, it would

be valuable to study the personality-occupational orientation relationship by using high-point profiles of each (i.e., considering the relationship between an individual's two highest scores on both the PACL and the SII). In reality, people are more accurately described by combinations of occupational themes and combinations of personality styles, rather than single themes. It is hoped that future research will address these issues.

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