# Journal of Issues in Intercollegiate Athletics

Do International Student-Athletes View the Purpose of Sport Differently than United States Student-Athletes at NCAA Division I Universities?

# Nels Popp Ph.D.

Illinois State University

# Mary A. Hums Ph.D.

University of Louisville

# T. Christopher Greenwell Ph.D.

University of Louisville

Over 16,000 international student-athletes competed at National Collegiate Athletic Association schools during the 2006-07 school year (NCAA, 2008). Many of these students came to the United States with far different sporting backgrounds than their United States-born counterparts, shaping their perspectives of high-level university sport competition. The purpose of this study was to examine differences among domestic and international NCAA Division I student-athletes' views of the purpose of collegiate sport. Responses to a Purpose of Sport Questionnaire for 174 international student-athletes from 49 different countries were compared to those from 110 United States-born student-athletes. A statistical test of MANOVA revealed international student-athletes rated the competition aspect of the purpose of college sports significantly lower than domestic student-athletes. Utilizing a second MANOVA, comparisons were made between student-athletes from different geographical regions. Student-athletes from Western European nations rated good citizenship as a purpose of collegiate sport significantly lower than student-athletes from Eastern Europe, Central and South America, and the United States.

he face of collegiate sport in National Collegiate Athletic Association (NCAA) competition is changing to represent the increasing diversity in the United States population. Recent statistics from the association indicate that over 16,000 student-athletes from countries outside the United States competed for NCAA institutions in 2006-07 (NCAA, 2008). In the

Downloaded from http://csri-jiia.org

United States, children grow up cheering for their favorite university teams and many have dreams of someday wearing the uniform colors of those squads. Some athletes dream of using the intercollegiate sport experience as a stepping stone to a professional sport career. Whether for fame or fortune, because a scholarship is a way to help earn a college education, a university town has a certain social appeal, participation in athletics could lead to a job after college, or the desire to play for a respected and successful coach, NCAA student-athletes view the purpose of collegiate sport in different ways.

But what of the athlete who honed his or her basketball skills on a club court in France, the soccer player whose career began on a dusty pitch in Tanzania, the tennis player whose home club was in Malaysia, or the swimmer whose first strokes were in a pool in Greece? In this world of instant internet information, it is difficult for a potential star to go unnoticed anywhere in the world. Yet these young athletes, who now often find themselves representing NCAA schools, bring with them an entirely different background in sport, and are products of different development systems. Many of them come from countries where university sport as North Americans know it, does not even exist. When they are recruited, arrive, and compete in the United States, what does the opportunity to compete in university sport mean to them?

# Purpose of Study

The purpose of this study is to determine if international student-athletes view the purpose of participating in NCAA Division I university sports differently than do domestic student-athletes. The study also attempts to gauge whether differences exist between student-athletes from different geographical regions in their view of the purpose of NCAA Division I university sport. One limitation of nearly all studies of international student-athletes is the tendency to group all international student-athletes together. Because international student-athletes come from so many different countries and backgrounds, those from Germany are likely to hold different perspectives than those from Ghana, China, or Argentina. Thus an effort was made in this particular study to begin examining international student-athletes not as a whole, but as groups hailing from similar geographic regions and political systems.

A primary reason why international student-athletes may be expected to view the college sport experience differently than domestic student-athletes is the fact international student-athletes grow and develop their athletic skills in a variety of regional and national sport systems. These sport systems stem from various national sport policies which can shade participants' views of the purpose of sport participation. Thus, this paper begins by examining literature outlining differences in national sports policy.

## National Sport Policies

National sport policies impact sport participants in several ways. Sport policy legislation dictates participants' access to sport opportunities, determines which sport organizations will have access to limited resources, affects national health issues, and helps foster national pride (Chalip, Johnson, & Stachura, 1996; Frey & Eitzen, 1991). In some countries, the opportunity to play sport in schools, in sport clubs, or recreationally, is available to all. In others, such opportunities are rare or non-existent. In the United States, many sporting options for young

athletes stem from a school-based sport system, while in many countries outside the United States, a club-based system exists (Brennan & Bleakley, 1997; Chalip, Johnson, & Stachura, 1996; Rubingh & Broeke, 1998). The reasons specific sport policies are introduced or implemented in nations often arise from political and financial influences (Harvey, Beamish, & Defrance, 1993; Henry & Nassis, 1999; Slack, Berrett & Mistry 1994). For many countries, success in elite sport at international competitions is of utmost importance, with large sums of money funneled through national sport bodies in an effort to develop the world's top athletes (Green, 2004; Oakley & Green, 2001). Other countries emphasize the "Sport for All" model to provide sporting opportunities and improve health for all citizens, regardless of age, gender, ability, religion, refugee status, social economic class, or sexual orientation (Chalip, Johnson, & Stachura, 1996; Hartmann-Tews, 1999; Jamieson & Zhivei, 2000; Thoma & Chalip, 1996). The standard of coaching, the condition of sports venues and equipment, the financial and time costs of involvement, the opportunity for participation and advancement, and the creation of an enjoyable experience all play important roles in determining whether youth will continue to play sport and remain physically active into adulthood and throughout their lifetime (Butcher, Linder, & Johns, 2002; Palm, 1991; Vanreusel, Renson, Beunen, Classens, Lefevre, Lysens, & Vanden Eynde, 1997).

Some researchers who examined issues related to international student-athletes have cited a primary motivation for these young athletes to temporarily relocate is to obtain access to better coaching and facilities (Bale, 1987) and because of intercollegiate athletics attractiveness (Jones, Koo, Kim, Andrew, & Hardin, 2008). Such evidence suggests international studentathletes might not be satisfied with the sporting opportunities available in their native countries as laid out through specific national sport policy. Thus, international student-athletes could perceive the purpose of collegiate sport differently than those student-athletes who grow up under a national sport policy which includes NCAA governed college athletics.

#### International Student-Athletes

The recruitment of international student-athletes to compete at U.S.-based NCAA schools has been occurring since the 1950s (Ridinger & Pastore, 2001; Stidwill, 1984), although as illustrated earlier, the volume of foreign-born athletes making their way to U.S. universities is certainly on the rise. Some researchers (Craven, 1994; Duda & Allison, 1990) have suggested the study of cross-cultural sport participation could show differences as to why various groups participate in sport and have called for further investigation. Only a few sport psychology researchers (Hayashi & Weiss, 1994; Ryaska, 2001) have heeded the call and none have examined perceived differences for sport participation among international student-athletes. despite their increasing abundance in the U.S.

Nearly 70% of international student-athletes are enrolled at NCAA Division I institutions (NCAA, 2008). These student-athletes have not only been quite successful for their adopted teams (Drape, 2006; Litsky 2003) but often represent their home nation's elite athletes as well. A number of NCAA foreign-born athletes compete for their home country's Olympic or national team. Brown (2004) reported 40% of swimming medalists in the 2004 Athens Summer Games had competed at NCAA institutions, while the Associated Press (2004) listed numerous current and former international track and field student-athletes who would be representing their home

nation in the Athens Games. Several foreign-born stars in the National Basketball Association (such as Australian Andrew Bogut, Canadian Steve Nash, and British national Luol Deng) and the National Hockey League (such as Austrian Thomas Vanek and Canadians Martin St. Louis and Jonathan Toews) are former NCAA Division I international student-athletes, as are elite professional golfers Annika Sorenstam, Rory Sabbatini, and Steve Elkington.

Despite competing at an equally high level as their U.S. counterparts, international student-athletes have been shown to look at university sport participation from a different perspective. Stidwell (1984) examined differences in athletic motivation between domestic and international university track and field athletes and found a significant difference in perceived athletic confidence, with international student-athletes demonstrating higher levels of confidence in their ability to achieve success. Bale (1987; 1991) examined the migration decisions of international student-athletes and their cross-cultural experiences, highlighting several adjustment factors based on anecdotal and quantitative evidence while Jones et al. (2008) looked at the motivations of international student-athletes to travel to the U.S. No prior researcher, however, has quantitatively compared motivations to those of domestic student-athletes. Popp (2006) found international student-athletes felt their university athletic experience was different than their domestic teammates in several ways. International student-athletes reported placing a higher importance on academic achievement and a lower emphasis on mental preparation and the competitive aspect of university competition than domestic teammates. Popp also noted international student-athletes felt weight training was emphasized more heavily in NCAA Division I competition.

Several authors have noted the different sporting paths international student-athletes take on their way to NCAA competition (Bale, 1987; 1991; Popp, 2006; Ridinger & Pastore, 2000; Weston, 2006). Most international student-athletes develop their talents in the club-based system, while most United States-born student-athletes hone their sporting skills in school-based competition (Rubingh & Broeke, 1998). For better or worse, high school sport in the United States is sometimes seen as a training ground for top college athletes (Hoch, 2006; Scholand, 2007). Such a difference would also likely contribute to a different perspective on the purpose of participating in university sport.

#### Purpose of Sport

Few studies have attempted to measure the purpose of sport participation from the participant's perspective. Duda (1989) examined the motivational tendencies of task-oriented and ego-oriented athletes and found a relationship existed between such orientation and perception of the purpose of sport participation. She suggested in the athletic arena, individuals who are more task-oriented will view the purpose of sport as important for its ability to develop positive attributes in the participant such as good health, satisfaction in mastering a skill, and learning team work. She suggested individuals who were ego-oriented would view the purpose of sport as competition, enhancing one's social position, and winning. In her analysis, the reasons individuals participated in sport fell under seven categories. Duda (1989) labeled those factors as: (a) mastery/cooperation, (b) physically active lifestyle, (c) good citizen, (d) competitiveness, (e) high-status career, (f) enhance self-esteem, and (g) social status/getting ahead.

From her original research, Duda (1989) developed the Purpose of Sport Questionnaire, which measures the way athletes perceive their own sport participation based on the seven factors listed above. Participants who rated mastery/cooperation highly felt sports should teach people to try their best, teamwork, and sportsmanship. Those who rated physically active lifestyle highly felt sports should teach individuals to be physically fit. Participants rating good citizen highly felt sport should help teach things like loyalty, willingness to sacrifice for the good of the team, and respecting authority. A high rating for the factor of competitiveness meant participants thought sports should teach competition and aggression. Those who rated high-status career highly thought sport participation would help lead to a good career. Participants who rated enhance self-esteem highly thought sports would improve self-confidence, make them feel important, make them feel like a winner, and help them set high standards. Those who rated social status/getting ahead highly felt sport would improve one's popularity and standing with

This Purpose of Sport Questionnaire (Duda, 1989) has since been used in several other studies to detect differences in participants' perceptions of the purpose of sport. White (1995) used the instrument with university students to detect differences between varsity and recreational sport participants. Other studies used the instrument to detect differences in perception of purpose of sport between amateur and professional English rugby players (Treasure, Carpenter, & Power, 2000) and between amateur and professional English football players (Carpenter & Yates, 1997). This is the first study, however, to utilize the Purpose of Sport Questionaire (Duda, 1989) with a cross-cultural sample.

## Method

# Sample

The population for this study consisted of both domestic and international studentathletes attending NCAA Division I universities. The schools selected for the study were made via purposive cluster selection. Bale (1991) suggested school location and size of school could impact international student-athlete school selection. Thus, the schools selected for participation in this study included those located in the east, midwest, and west regions of the U.S. in both larger metro and smaller rural communities, and included schools with both small and large enrollments. Phone calls were made to CHAMPS/Life Skills Program Coordinators, a group of administrators who work closely with international student-athletes (NCAA, 2004), at selected NCAA Division I schools, soliciting their participation. Initially, 22 coordinators were solicited and 15 agreed to participate in the study. These 15 schools had a total of 464 international student-athletes listed on their athletics websites. For each international student-athlete listed, one domestic student-athlete from the same sport was randomly selected at each institution to help ensure respondents mirrored non-respondents during sampling.

#### Instrumentation

The survey instrument used in the study was a modified version of Duda's (1989) Purpose of Sport Questionnaire. The original Purpose of Sport Questionnaire, which contains 46

Downloaded from http://csri-jiia.org

items, was based in part upon the Purpose of Schooling Questionnaire (Nicholls, Patashnick, & Nolen, 1985; Thorkildsen, 1988) and in part on other literature dealing with the values and benefits of sport participation. Duda ran responses from her questionnaire through a factor analysis, and found seven main factors emerged: (a) mastery/cooperation, (b) Physically active lifestyle, (c) good citizen, (d) competitiveness, (e) high status career, (f) enhance self-esteem, (g) social status/getting ahead. All factors produced strong levels of internal consistency in her study, with Cronbach's alpha coefficients ranging from .75 to .83 (Duda, 1989). White (1995) used the Purpose of Sport Questionnaire with college students and also found strong levels of internal consistency among the same seven factors, with Cronbach's alpha coefficient scores ranging from .79 to .87.

In the original Purpose of Sport Questionnaire, participants responded to the phrase "A very important thing sport should do is..." by rating different concluding phrases to this stem on a 5-point, Likert-type agreement scale. When developing her instrument, Duda (1989) ran all items through a factor analysis, keeping the 46 items which produced factor loading scores above .40. In an effort to reduce the number of items used for this current study, which in turn would improve the response rate, only the items producing factor loadings above .55 in Duda's (1989) study were utilized. This decision reduced the number of items kept in the scale to 31. In addition, two items were eliminated from the original Purpose of Sport Questionnaire because of their irrelevance to university student-athletes. The Purpose of Sport Questionnaire was originally designed for high school students and included the items "An important thing sport should do is help us get into the best colleges" and "An important thing sport should do is give us the chance to be friends with popular kids" but both these items were deleted from the instrument utilized in this study. The final instrument contained 29 items from the Purpose of Sport Questionnaire with at least three items retained for each of the seven factors. Three different items were used to measure the factors of mastery/cooperation and physically active lifestyle. Four different items were used to measure the factors of competitiveness, high status career, and social status/getting ahead. Five items were used to measure high status career and six items were used to measure the factor good citizen. For each of these seven constructs, mean scores were calculated from the responses. Six demographic items: (a) gender, (b) year in school, (c) native country, (d) years spent in the United States, (e) approximate cumulative grade point average, and (f) sport played in college were also collected.

#### Data Analysis

To conduct this study, two multivariate analyses of variance (MANOVA) were performed in order to compare group means between different cohorts. In the first MANOVA, the dependent variables were the seven factors comprising the Purpose of Sport Questionnaire, while the independent variable was international or domestic status. In the second MANOVA, geographic region served as the independent variable. All participants were placed into one of seven geographic regions depending on what country they listed as their home nation. Group means for the seven purpose of sport scores were then compared between regions. Tabachnick and Fidell (2001) suggested use of a sample size which has a greater number of participants per cell than dependent variables in the study for use of MANOVA. In this particular study, both MANOVAs had seven dependent variables, namely the scores from the seven purpose of sport

factors. Thus, at least eight participants per cell were necessary. In addition, Mardia (1971) suggested a minimum of 20 participants per number of cells in tests of MANOVA. In the current study, there was one independent variable (student-athlete status or geographic region) and seven dependent variables (purpose of sport factors) in both MANOVAs. Thus, 140 (7 x 20) total participants were needed, half of whom were international student-athletes and half of whom were domestic student-athletes. The sample in this study met both criteria.

### Results

The following is a list of the important demographic variables in this study. Fifteen schools initially agreed to participate in the study, but ultimately only 11 schools followed through with data collection by returning surveys. Of those 11 schools, six were members of the Football Bowl Subdivision (FBS) conferences with enrollments ranging from approximately 12,000 to 46,000, while five were non-FBS schools with enrollments ranging from approximately 2,800 to 10,000. Also, six of the schools were located in metro areas with a local population of over 250,000, while five of the schools were located in communities with populations below 250,000. Finally, the sample included three schools located in the eastern third of the U.S. four located in the middle third, and four located in the western third.

Table 1 – *Native Country of Respondents* (n = 174)

Native Country	No.	%
Canada	49	28.2
Germany	11	6.3
Australia, Sweden	8	4.6
Norway	7	4.0
England, Poland	6	3.5
Jamaica, Netherlands, South Africa, Serbia	4	2.3
Austria, Cameroon, France, Italy, Mexico, Russia, Slovenia, Ukraine	3	1.7
China, Croatia, Ireland, Kenya, Latvia, Puerto Rico, Slovakia, Trinidad and Tobago, Venezuela	2	1.2
Argentina, Barbados, Columbia, Dominican Republic, Ecuador, Ghana, Honduras, Ivory Coast, Israel, Japan, Lebanon, Liberia, Lithuania, Mali, New Zealand, Singapore, Somalia, Tonga, Tunisia,		
Uruguay, Zimbabwe	1	0.6

In total, 649 surveys were sent to the 11 participating schools, with 338 of those surveys directed towards international student-athletes and 311 surveys directed toward domestic student-athletes. Of those surveys, 13 were returned blank because the student-athletes they were addressed to were no longer enrolled at the school. Thus the final sample size for this study was 636 student-athletes. Of that sample, 284 surveys were returned for a response rate of 44.7%. Returned responses came from 110 domestic student-athletes and 174 international student-athletes.

All student-athletes were asked to indicate what they considered to be their native country. Respondents named 50 different countries. A complete list of frequencies can be found in Table 1. In the last study conducted by the NCAA (1996) exclusively on international student-athletes, the largest percentage of international student-athletes came from Canada (28.4%), followed by England (6.3%), Sweden (5.8%), Australia (3.2%), Germany (2.6%), South Africa (2.5%), Jamaica (2.3%), Ireland (2.2%), Brazil (2.1%), and Norway (1.8%). Eight of the top 11 countries (outside the United States) with the highest representation in the current study were also among the top 10 in the NCAA study, with Canada comprising by far the largest single-nation percentage in both studies at just over 28%.

Table 2 – Sports Played by Respondents (n = 284)

Sport	No.	%
Tennis	66	23.2
Soccer	37	13.0
Swimming	33	11.6
Basketball	27	9.5
Track and Field	22	7.7
Volleyball	22	7.7
Golf	15	5.3
Rowing	14	4.9
Skiing	12	4.2
Ice Hockey	8	2.8
No Sport	5	1.7
Football	4	1.4
Gymnastics	4	1.4
Softball	4	1.4
Cross Country	3	1.1
Lacrosse	3	1.1
Water Polo	3	1.1
Field Hockey	2	0.7

In addition, the sample contained participants from 16 different sports, with the highest percentages in tennis (23.2%), soccer (13.0%), swimming (11.6%), basketball (9.5%), track and field (7.7%), volleyball (7.7%), and golf (5.3%). According to the 2006 NCAA national participation report, the top six sports with the highest concentration of non-resident aliens were

Downloaded from http://csri-jiia.org

tennis, track and field, soccer, basketball, golf, and swimming, meaning the top seven represented sports in this study closely mirrored the top six in the NCAA report. In addition, nearly all sports were equally represented by both domestic and international student-athletes in this study with the exceptions of tennis and rowing, which had higher concentrations of internationals. A complete list of sport frequencies can be found in Table 2.

Among respondents, 127 (44.1%) were male and 157 (54.5%) were female. Among respondents indicating both gender and international or domestic student-athlete status, 45 were domestic males while 67 were domestic females. Among international student-athletes, 82 were male and 90 were female. Because participants in this study were selected via a clustered random selection process and because of the demographic data outlined above, the sample in this study is believed to be representative of the population.

# Scale Reliability and Consistency

Once all the data from the study were collected, all seven scales in the instrument were assessed for reliability through an analysis of inter-item consistency. Cronbach's alpha coefficients were derived for all scales. Among the Purpose of Sport scales, five produced relatively high Cronbach's alpha scores between .710 and .855, falling in an acceptable range according to Nunnally and Bernstein (1994). The other two scales, namely Mastery/Cooperation and High Status, produced Cronbach's alpha coefficients of .626 and .585, respectively. The elimination of one item in the High Status scale significantly improved inter-item consistency, so a decision was made to drop the item "A very importing thing college sports should do is give us a chance to be a professional athlete," which improved the consistency rating to .666. Aiken (2000) stated when gauging significant differences between group means, scale reliability scores between .60 and .70 are acceptable. Mean scores for the seven Purpose of Sport Questionnaire factors are listed in Table 3. These alpha coefficient scores indicated that the items used to gauge each factor were highly related.

Table 3 – Mean Scores and Standard Deviations on Purpose of Sport Questionnaire

Factor	Domestic M (SD)	International $M(SD)$
Self-Esteem	4.35 (0.53)	4.34 (0.61)
Good Citizen	4.26 (0.59)	4.13 (0.59)
High Status	4.20 (0.68)	4.21 (0.72)
Physically Active	4.19 (0.87)	4.11 (0.89)
Mastery and Cooperation	4.10 (0.84)	4.24 (0.79)
Competitiveness	4.03 (0.73)	3.77 (0.77)*
Social Status	2.74 (1.04)	2.82 (1.02)

<sup>\*</sup>p < .05

*Note.* Mean scores based on 5-point Likert-type scale

When conducting the first MANOVA, the seven purpose of sport scores served as dependent variables, while international or domestic status served as the independent variable. The MANOVA revealed a significant effect, Wilks  $\Lambda$  = .938, F(7, 276) = 2.617, p = .012,  $\eta^2$  = .06. A follow-up univariate F-test was conducted to determine where significant differences existed among the specific factors. Because of the multiple ANOVAs conducted, a Bonferroni adjusted alpha level of .007 was utilized to account for Type I error. Only one factor, competitiveness (p = .004), revealed a significant difference between international and domestic student-athletes. The mean score for domestic student-athletes in the competitiveness factor was 4.03, while the mean score of international student-athletes was 3.77. These results indicated domestic student-athletes felt stronger than did international student-athletes that the purpose of university sports was about learning to be more competitive.

In the second MANOVA, countries represented in the sample were divided into seven geographic regions. These regions were labeled as follows with the countries included listed in parentheses: United States (United States; n = 110); Canada (Canada; n = 49); Western Europe (Austria, England, France, Germany, Ireland, Italy, Netherlands, Norway, and Sweden; n = 47); Eastern Europe (Croatia, Latvia, Lithuania, Poland, Russia, Serbia, Slovakia, Slovenia, and Ukraine; n = 26); Americas (Argentina, Barbados, Colombia, Dominican Republic, Ecuador, Honduras, Jamaica, Mexico, Puerto Rico, Trinidad and Tobago, Uruguay, and Venezuela; n = 20); Africa (Cameroon, Ghana, Ivory Coast, Kenya, Liberia, Mali, Somalia, South Africa, Tonga, Tunisia, and Zimbabwe n = 17); and Other (Australia, China, Israel, Japan, Lebanon, New Zealand, and Singapore; n = 15).

When conducting the second MANOVA, the purpose of sport scores served as dependent variables, while geographic regions served as the independent variable. A list showing geographic region mean scores for the seven purpose of sport factors can be found in table 4. This second MANOVA revealed a significant effect, Wilks  $\Lambda$  = .746, F(42, 1275.6) = 1.958, p = .000,  $\eta^2$  = .05. A follow-up univariate F-test was conducted to determine where significant differences existed among the specific factors. Again, because of the multiple ANOVAs conducted, a Bonferroni adjusted alpha level of .007 was utilized to account for Type I error. Differences between regions emerged for only one factor, good citizen (p = .001). Because the independent variable had more than two levels, a Tukey Post Hoc test was conducted to determine which specific regions were significantly different. The results of this Post Hoc test revealed the significant differences to exist between Western Europe and the regions of Eastern Europe (p = .003), the Americas (p = .004), and the United States (p = .030). These significant differences mean Western Europeans felt the purpose of university sport was less about teaching good citizenship than did respondents from Eastern Europe, Central and South America, and, to a lesser degree, the United States.

(1.15)

Scale	U.S.	Canada	W. Europe	E. Europe	Americas	Africa	Other	
	M(SD)	M(SD)	M(SD)	M(SD)	M(SD)	M(SD)	M(SD)	
Mastery/ Cooperation	4.10 (.84)	4.24 (.73)	4.10 (.87)	4.44 (.54)	4.60 (.68)	4.03 (.76)	4.07 (1.07)	
Phy. Active	4.19 (.87)	4.23 (.94)	3.85 (.88)	4.32 (.73)	4.35 (.83)	4.16 (.71)	3.80 (1.15)	
Good Citizen	4.26 (.59)	4.11 (.56)	3.88 (.56)	4.42 (.42)	4.36 (.48)	4.26 (.66)	4.04 (.70)	
Competitive	4.03 (.73)	3.93 (.77)	3.64 (.66)	3.79 (.72)	3.98 (.87)	3.61 (.84)	3.52 (.92)	
High Status	4.20 (.68)	4.19 (.70)	4.14 (.78)	4.49 (.48)	4.43 (.57)	4.17 (.66)	3.80 (.96)	
Self-Esteem	4.35 (.53)	4.29 (.68)	4.27 (.68)	4.55 (.42)	4.51 (.57)	4.28 (.52)	4.23 (.51)	
Social Status	2.74	2.83 (.99)	2.68 (.89)	3.27	2.39 (.88)	3.13	2.65 (1.22)	

Table 4 – Mean Scores and Standard Deviations for Region on Purpose of Sport Factors

*Note.* Mean scores based on 5-point Likert-type scale

(1.03)

## **Discussion**

(1.03)

The findings of this study are interesting for several reasons. The data were collected from student-athletes who called 50 different countries home. Any significant findings between international and domestic student-athletes compared the opinions of representatives of 49 different nations to those of United States participants. Thus the finding that domestic studentathletes found college sport to be more about competition than international student-athletes takes on added significance. Does the reason have something to do with the limited elite, postuniversity sport options available to United States student-athletes? Or does this difference have to do with the sport system employed in the United States? Are young athletes in the United States indoctrinated into sporting culture differently than those in most other countries?

In the United States, collegiate sport often represents the pinnacle of elite sport competition for many athletes. As a popular NCAA public service announcement proclaims, "There are over 380,000 NCAA student-athletes and most of us will go pro in something other than sports" (Christianson, 2007, p. 1). Finding elite competition after university for former student-athletes who do not join the professional sporting ranks is much more difficult in the United States than in many other nations where club-based systems provide elite sport competition for people well into adulthood (Brennan & Bleakley, 1997; McBride, J., 2006; Popp, 2006). Because elite university sports are seen as the highest level of athletic participation for many domestic student-athletes, perhaps university competition takes on a higher priority for United States-born athletes than for international student-athletes. International student-athletes,

Downloaded from http://csri-jiia.org

on the other hand, may view the university athletic experience as more than just a sporting endeavor, which could cause them to de-emphasize the athletic component while emphasizing other aspects of the university experience. Howard-Hamilton and Sina (2001) found university student-athletes often define success and achievement at school based primarily on athletic accomplishment. Bale (1987), meanwhile, suggested academic achievement is a critical motivation for many international student-athletes. The debate on the emphasis NCAA Division I student-athletes place on academics is a highly contentious issue in the United States, but perhaps international student-athletes prioritize their goals differently than do their domestic teammates.

Another possible justification regarding the differences found in the importance of competition for university athletes may rest in differences of psychological motivation between athletes raised in the United States compared to those raised elsewhere. In Guest's (2007) study of university soccer players in the United States and Malawi, United States student-athletes overwhelmingly indicated a major reason for participating in university sport was competition. Not a single Malawi player, however, mentioned competition as a motivation. Guest suggested United States university athletes see sport as more of a competitive proving ground in which they desire to overcome challenges, obstacles, and opponents. The Malawi athletes, meanwhile, seemed to be motivated toward sport participation as a way to show or express their abilities and talents regardless of competitive success. Popp (2006) found international student-athletes tended to believe United States coaches emphasized a "killer instinct" and "winning-is-everything" attitude from an early age, while coaches in their homelands seemed to emphasize the participation and health benefits of youth sport rather than the competition aspect. This study may offer some evidence that the way elite athletes are originally introduced to sport could impact their perspective on collegiate competition.

In addition, this finding could have implications for the numerous college coaches who are now recruiting internationally. If international student-athletes are less motivated by the competitiveness of university sport, perhaps recruiters need to alter the pitches made to international student-athletes as compared to those directed at domestic student-athletes. An international student-athlete unfamiliar with NCAA conferences will likely not be motivated by the chance to win a Big 10, Atlantic Coast Conference, or Big East title, yet such pitches are commonplace during the recruitment of domestic student-athletes. The international student-athlete may be more interested in other aspects of the "big time" university sports experience rather than the highly competitive nature or "wins-and-losses" side of university sport. Further research on the university selection process of international student-athletes is certainly warranted.

Another interesting finding with the current study was student-athletes, regardless of national origin, rated collegiate sport as enhancing career status relatively high. International and domestic student-athletes rated the factor nearly identical and as the third highest rated factor among the seven listed. This is interesting for two reasons. First, in White's (1995) study, Division I student-athletes rated the career status factor fairly low; fifth among the seven factors with a mean score of 2.96 on a 5-point scale. By comparison, domestic student-athletes in the current study produced a mean score of 4.20 in the same category. In the almost 15 years since the White (1995) study, perhaps something changed in the student-athletes' perception of "career". It may be that more student-athletes today believe they have a greater chance to pursue

a "career" as a professional athlete, and interpreted the question in that way. This is a somewhat mysterious finding and one that needs further evaluation.

Second, international student-athletes rated career status as high as domestic studentathletes, yet it is doubtful many of their potential employers--should they return to their native nations--will be familiar with NCAA competition or the schools they attended while studying in the United States. It is hard to draw conclusions from this single factor, but further examination could reveal intriguing findings. Do employers favor graduates who play university sport, even if the employer knows little about the type or level of competition? Or do most international student-athletes intend to remain in the United States after they graduate and feel their status as a student-athlete will open doors to potential employers? Perhaps international student-athletes simply felt Division I university sport taught them things which will translate into becoming a more attractive and productive person in the work world. The idea of college sports teaching student-athletes attributes which make them attractive employees is often cited by employers but has little empirical backing (Argent & Robinson, 2005).

Differences in the view of the purpose of sport by student-athletes from different geographic regions were also intriguing, although only the broadest surface summations can be made regarding these findings. In terms of university sport teaching good citizenship, studentathletes from Western European nations rated such factors significantly lower than those from other geographic regions, including Eastern Europeans and Central and South Americans. It is difficult to infer why these differences exist. Perhaps, the sport systems in place in Eastern Europe or in Central and South America place greater emphasis on certain attributes of sport participation such as discipline, sacrifice, and loyalty, which might help explain why those nations rated good citizenship at a higher level than participants from Western Europe. In particular, Eastern European sport development systems, while somewhat shrouded in the secrecy of the Cold War era, placed a great deal of emphasis on the importance of winning for national pride and establishing those nations as successful on the international scene (Green & Oakley, 2001; Riordan, 1996). Such a notion certainly requires further exploration, but this particular study offers a jumping off point. Future studies examining this issue will need to collect data from greater numbers of participants to gauge the validity of such assumptions.

## **Implications**

This study has implications for both researchers and practitioners. As mentioned previously, there is a dearth of studies on NCAA international student-athletes. The current study, along with works by Ridinger and Pastore (2000) and Bale (1987; 1991) as well as Jones et al. (2008), merely scratch the surface of the many questions to be answered about this population. Academic achievement, social adjustment, graduation rates, retention rates, postathletic careers, assimilation back into home culture for athletes who return after competing in the U.S., and university selection decisions, are all areas waiting to be explored. International student-athletes also offer national sport policy researchers an interesting population in which to help monitor and compare the effects of policies. International student-athletes, particularly at the NCAA Division I level, often represent some of the top sporting talent a country develops. Comparing the feelings and perspectives of these elite athletes from all over the globe can offer valuable insights into the way youth sport policy impacts young star athletes.

Downloaded from http://csri-jiia.org

University sport administrators could take heed of findings from studies on international student-athletes as well. Considering the substantial investment athletic departments make in recruiting these athletes, coaches and administrators need to know how to interact, and help their teams interact, with student-athletes from around the world. In addition, student-athlete support services personnel need to know how to facilitate success for these international student-athletes, both in academics and from a social perspective. Helping these international student-athletes transition into a different culture can only help them be better athletes as well. Studies on crosscultural sojourners such as those conducted by Adler (1975); Befus (1988) and Chapdelaine and Alextich (2004), indicate a U-Curve of transition into a new culture, where individuals go through phases of assimilation (contact, disintegration, reintegration, autonomy, and independence). Awareness of this developmental process could assist sport administrators in helping international-student athletes adjust to life in a new culture, both on and off the playing field.

This study helps open the door for much more work in this area. The increasing number of international student-athletes adds a welcome new dimension to NCAA sport. Knowing these student-athletes are here is one thing. Knowing who they are and what they need to help them be successful is another thing entirely. Academics and practitioners have much work to do in learning more about this ever-growing population of international student-athletes.

#### Limitations

While we believe this study adds to the limited literature regarding international student-athletes, it does have certain limitations. One limitation was the use of an intermediary, the CHAMPS/Life Skills coordinators, to extract data. Many NCAA schools are reluctant to allow their student-athletes to be involved in research without the school's involvement, thus a decision was made to work with CHAMPS/Life Skills coordinators. While most NCAA Division I schools have such a position on staff, not all do, meaning the sample did not include student-athletes from schools without a coordinator. In addition, four coordinators originally agreed to be part of the study, but then did not follow through with survey collection, limiting the sample size.

A second limitation with the study was the relatively low inter-item consistency ratings for two of the factors measured on the Purpose of Sport Questionnaire. Those two factors produced inter-item Cronbach's alpha coefficients of under .70, which is generally considered to be the cut-off for acceptable reliability. Once an item was dropped, both factors had Cronbach's alpha coefficients above .625, which according to Aiken (2000) is an acceptable level. When considering the results of this study, however, these slightly lower inter-item relationships should be accounted for.

A third limitation of the study is the sample group size of the different regions for international student-athletes. While the sample sizes were adequate for the types of statistical analyses used in the study, they do limit the power. While thousands of international student-athletes compete at U.S. colleges, they represent hundreds of countries, making it difficult to obtain a large representation of athletes from each region. According to NCAA data (1996), many international students hail from Canada and Europe, with much smaller representations from Asia and Africa. Thus, grouping international student-athletes by region can be problematic when trying to obtain both an adequate sample size and a representative sample which mirrors

current international student-athlete distribution. Somewhat related to this limitation is the fact only international student-athletes participating at NCAA Division I schools were selected for this study. Roughly 30% of international student-athletes at NCAA schools compete in the Division II or Division III ranks, while many other international student-athletes compete on National Association of Intercollegiate Athletics (NAIA) or junior college teams.

# References

- Adler, P. (1975). The transitional experience: An alternative view of culture shock. *The Journal* of Humanistic Psychology, 15, 13-23.
- Argent, E., & Robinson, L. (2005, June). From the locker room to the boardroom: Developing leaders through sport. Paper presented at the meeting of the North American Society for Sport Management, Regina, Saskatchewan, Canada.
- Aiken, L.R. (2000). Psychological testing and assessment. Boston: Allyn and Bacon.
- Associated Press. (2004, June 13). NCAA track stars look ahead to Athens. NBC Sports website retrieved on July 9, 2008 from http://nbcsports.msnbc.com/id/5202355
- Bale, J. (1987). Alien student-athletes in American higher education: Locational decision making and sojourn abroad. Physical Education Review, 10(2), 81-93.
- Bale, J. (1991). The brawn drain: Foreign student athletes in American universities. Urbana, IL: University of Illinois Press.
- Befus, C. P. (1988). A multilevel treatment approach for culture shock expereiened by sojourners. International Journal of Intercultural Relations, 12, 381-400.
- Brennan, D., & Bleakley, E. W. (1997). Predictors, patterns and policies for post-school participation. In J. Kremer, K. Trew, & S. Ogle (Eds.), Young People's Involvement in Sport (pp. 78-97). London: Routledge.
- Brown, T. (2004, December 6). Foreign matter: Influx of internationals in college swimming tugs on bond between campus and country. NCAA News, p 5.
- Butcher, J., Linder, K., & Johns, D. (2002). Withdrawl from competitive youth sport: A retrospective ten-year study. Journal of Sport Behavior, 25(2), 145-163.
- Carpenter, P. J., & Yates, B. (1997). Relationship between achievement goals and the perceived purposes of soccer for semiprofessional and amateur players. Journal of Sport & Exercise Psychology, 19, 302-311.
- Chalip, L., Johnson, A., & Stachura, L. (1996). National sports policies. Westport, CT: Greenwood Press.
- Chapdelaine, R. F., & Alextich, L. R. (2004). Social skills difficulty: Model of culture shock for international graduate students. Journal of College Student Development, 45, 167-184
- Christianson, E. (2007, March 13). NCAA launches latest public service announcements, Introduces new student-focused website. NCAA website retrieved on July 3, 2008 from http://www2.ncaa.org/portal/media and events/press room/2007/march/20070313 psa r elease.html
- Craven, J. (1994). Cross-cultural impacts of effectiveness in sport. In R.C. Wilcox (Ed.) Sport in the global village, (pp. 433-448). Morgantown, WV: Fitness Information Technology, Inc.

- Drape, J. (April 11, 2006). Foreign pros in college tennis: On top and under scrutiny, *New York Times*. Retrieved June 30, 2008 from http://www.nytimes.com/2006/04/11/sports/tennis/11tennis.html
- Duda, J. L. (1989). Relationship between task and ego orientation and the perceived purpose of sport among high school athletes. *Journal of Sport & Exercise Psychology*, 11, 318-335.
- Duda, J. L., & Allison, M. T. (1990) Cross-cultural analysis in exercise and sport psychology: A void in the field. *Journal of Sport & Exercise Psychology*, 12, 114-131.
- Frey, J. H., & Eitzen, D. S. (1991). Sport and society. Annual Review of Sociology, 17, 503-522.
- Green, M. (2004). Power, policy, and political priorities: Elite sport development in Canada and the United Kingdom, *Sociology of Sport Journal*, *21*, 376-396.
- Green, M., & Oakley, B. (2001). Elite sport development systems and playing to win: uniformity and diversity in international approaches. *Leisure Studies*, 20, 247-267.
- Guest, A. M. (2007). Cultural meanings and motivations for sport: A comparative case study of soccer teams in the United States and Malawi [Electronic Version]. *Athletic Insight*, 9(1). Retrieved June 19, 2008 from http://www.athleticinsight.com/Vol9Iss1/CulturalMeaningandMotivation.htm
- Hartmann-Tews, I. (1999). The idea of sport for all and the development or organised sport in Germany and Great Britain. *Journal of European Area Studies*, 7(2), 145-156.
- Harvey, J., Beamish, R., & Defrance, J. (1993). Physical exercise policy and the welfare state: A framework for comparative analysis. *International Review for Sociology of Sport*, 28(1), 53-63.
- Henry, I., & Nassis, P. (1999). Political clientelism and sports policy in Greece. *International Review for the Sociology of Sport*, 34(1), 43-58.
- Hayashi, C. T., & Weiss, M. R. (1994). A cross-cultural analysis of achievement motivation in Anglo-American and Japanese marathon runners. *International Journal of Sport Psychology*, 25, 187-202.
- Hoch, D. (2006, December). Help with the Recruiting Process. *Coach & Athletic Director*, 76(5), 14-15.
- Howard-Hamilton, M. F., & Sina, J. A. (2001). How college affects student athletes. *New Directions for Student Services*, *93*, 35-45.
- Jamieson, L. M., & Zhiwei, P. (2000, summer). Government policies on sport for all. *Journal for International Council for Health, Physical Education, Recreation, Sport, and Dance,* 36(4), 18-20.
- Jones, S. G., Koo, G., Kim, S., Andrew, D., & Hardin, Robin. (2008). Motivations of international student-athletes to participate in intercollegiate athletics. *Contemporary Athletics*, *3*(4), 295-314.
- Litsky, F. (2003, June 16). Foreign athlete presence is felt at NCAA meet. New York Times, D8.
- Mardia, K. V. (1971). The effect of nonnormality on some multivariate tests and robustness to nonnormality in the linear model. *Biometrika*, 58(1), 105-121.
- McBride, J. (2006). When the cheering stops. Athletic Management, 18(3), 37-44.
- NCAA. (1996). 1996 NCAA study of international student-athletes. Indianapolis, IN: NCAA.
- NCAA. (2004). CHAMPS/Life Skills Program. Indianapolis, IN: NCAA.
- NCAA. (2008). 1999-00 2006-07 NCAA student-athlete race & ethnicity report. Indianpolis, IN: NCAA.

- Nicholls, J. G., Patashnick, M., & Nolen, S. B. (1985). Adolescents' theories of education. Journal Educational Psychology, 77, 683-692.
- Nunally, J. C., & Bernstein, I. H. (1994). Psychometric theory (3<sup>rd</sup> ed.). New York: McGraw-
- Oakley, B., & Green, M. (2001). The production of Olympic champions: International perspectives on elite sport development system. European Journal of Sport Management, 8(1), 83-105.
- Palm, J. (1991). Sport for all: Approaches from utopia to reality. Schorndorf, Germany: Hofmann.
- Popp, N. (2006, September). *International student-athlete adjustment to U.S. universities:* Testing the Ridinger and Pastore adjustment model. Paper presented at the 14<sup>th</sup> European Association of Sport Management Congress, Nicosia, Cyprus.
- Ridinger, L., & Pastore, D. (2000). A proposed framework to identify factors associated with international student-athlete adjustment to college. International Journal of Sport Management, I(1), 4-24.
- Ridinger, L., & Pastore, D. (2001). Coaches perceptions of recruiting international studentathletes. International Council for Health, Physical Education, Recreation, Sport, and Dance Journal, 37, 19-25.
- Riordan, J. (1996). Communist sports policy: The end of an era. In L. Chalip, A. Johnson, & L. Stachura (Eds.), National Sport Policies (pp. 89-115). Westport, CT: Greenwood Press.
- Rubingh, B., & Broeke, A. (1998). The European sport club system. In L. P. Masteralexis, C. A. Barr, & M. A Hums (Eds.), *Principles and practice of sport management* (pp. 195-207). Gaithersburg, MD: Aspen Publishers.
- Ryska, T. (2001) The impact of acculturation on sport motivation among Mexican-American adolescent athletes. The Psychological Record, 51, 533-547.
- Scholand, G. (2007). Keeping it real. Athletic Management, 19(6), 24-30.
- Slack, T., Berrett, T., & Mistry, K. (1994). Rational planning systems as a source of organizational conflict. International Review for the Sociology of Sport, 29(3), 317-327.
- Stidwell, H.F. (1984). Motives toward track and field competition of foreign and domestic grantin-aid student-athletes in NCAA Division I colleges and universities. Unpublished doctoral dissertation, Oregon State University, Eugene.
- Tabachnick, B. G. & Fidell, L. S. (2001). Using multivariate statistics (4th ed.). Needham Heights, MA: Allyn & Bacon.
- Thoma, J. E. & Chalip, L. (1996). Sport governance in the global community. Morgantown, WV: Fitness Information Technology.
- Thorkildsen, T. A. (1988). Theories of education among academically able adolescents. Contemporary Educational Psychology, 13, 323-330.
- Treasure, D. C., Carpenter, P. J., & Power, K. T. D. (2000). Relationship between achievement goal orientations and the perceived purposes of playing rugby union for professional and amateur players. Journal of Sport Sciences, 18, 571-577.
- Vanreusel, B., Renson, R., Beunen, G., Claessens, A. L., Lefvre, J., Lysens, R., & Vanden Eynde, B. (1997). A longitudinal study of youth sport participation and adherence to sport in adulthood. International Review for the Sociology of Sport, 32(4), 373-388.

- Weston, M.A. (2006). Internationalization in college sports: Issues in recruiting, amateurism, and scope. *42 Williamette L Rev* 829.
- White, S. A. (1995). The perceived purpose of sport among male and female intercollegiate and recreational sport participants. *International Journal of Sport Psychology*, 26, 490-502.