A Cross-Cultural Extension of Goal Perspective Theory to Korean Youth Sport

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Kim, B.J. & Gill, D.L. (1997). A cross-cultural extension of goal perspective theory to Korean youth sport. Journal of Sport and Exercise Psychology, 19, 142-155.

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Abstract:

This study examined the predictions of goal perspective theory within Korean youth sport. Middle-school-aged athletes (244 males and 90 females) completed the Korean versions of Task and Ego Orientation in Sport Questionnaire (TEOSQ) and the Intrinsic Motivation Inventory (IMI). Both task and ego orientations were positively correlated with intrinsic motivation. Confirmatory factor analyses suggested that overall fit for the modified versions of the TEOSQ (10 items) and the IMI (13 items) were marginal. Gender x Grade (2 x 3) MANOVAs revealed that males were higher than females on two dimensions of intrinsic motivation (perceived competence and effort/importance). Canonical correlation analyses indicated that both task and ego orientation scores corresponded to the dimensions of the IMI. These findings are discussed in terms of cross-cultural generality and cultural specificity of the goal perspective theory.

Key words: intrinsic motivation, cross-cultural analysis, task and ego orientation

Article:

Goal perspective theories in educational contexts (Ames, 1984; Dweck, 1986; Nicholls, 1989) have been successfully adopted in the understanding of achievement motivation in sport. Although each theory represents a unique conceptualization, the construct of ability is common to all. For example, Nicholls's (1989) goal perspective approach argues that individuals in achievement situations strive to demonstrate ability. According to Nicholls, ability can be construed in two distinct ways. First, ability can be conceived in a self-referenced manner. This type of perspective is referred to as a *task goal orientation*. For task-oriented individuals, improvement and effort can lead to perceptions of competence and feelings of success. Second, ability can be construed in a norm-referenced manner via social comparison. This type of perspective is referred to as an *ego goal orientation*. To perceive themselves competent or to feel successful, individuals who are predominantly ego-oriented must outperform others or perform equally with less effort.

Goal perspective theory proposes interrelationships between individuals' goal orientation and motivational processes. An individual's goal orientation will presumably influence his or her cognitions, emotions, and behavior. Specifically, a task-oriented individual is assumed to choose a challenging task, exert maximum effort, experience intrinsic interest, and persist in the task, even in the face of difficulty. In essence, task orientation is associated with adaptive motivational behavior. Individuals with an ego orientation, and particularly with low perception of ability, are expected to avoid challenging tasks, exert minimum effort, and withdraw from sport following failure.

A growing body of literature in the sport domain (e.g., Duda, 1992; Duda, Chi, Newton, Walling, & Catley, 1995; Lochbaum & Roberts, 1993) provides some support for the anticipated relationships between goal orientation and motivation. For example, Duda et al. (1995) found a significant, positive association between task orientation and the overall intrinsic motivation score of the Intrinsic Motivation Inventory (IMI; McAuley, Duncan, & Tammen, 1989). Specifically, students high in task orientation tended to report greater enjoyment and effort. Ego orientation, consistent with the prediction of the authors, was negatively associated with intrinsic interest.

Recent studies on goal perspective theory within sport and physical education settings can be summarized into the following categories: (a) the development of sport-specific measures of goal orientations (Duda, 1989; Gill & Deeter, 1988); (b) the extension of goal perspective theory to other social cognitive theories such as the cognitive evaluation theory (Duda et al., 1995; Fortier, Vallerand, Brière, & Pronbencher, 1995; Goudas, Biddle, & Fox, 1994); (c) the identification of logically coherent patterns of relationships among goal orientation, beliefs about the cause of success (Newton & Duda, 1993), motives for sport participation (White & Duda, 1994), and sources for perceived competence (Williams, 1994); (d) affective reactions and perceptions of practice strategies (Lochbaum & Roberts, 1993); and (e) motivational reactions in physical education settings (Papaioannou, 1995; Treasure & Roberts, 1995).

Given that the purpose of the sizable body of studies on goal orientation is to generalize the predictions across diverse sport and physical education contexts, the amount of research on cultural variations of the theory is minimal. With few exceptions, such as works with British children (Duda, Fox, Biddle, & Armstrong, 1992; Goudas et al., 1994) and Greek adolescents (Papaioannou, 1995), the predictions of goal perspective theory have seldom been examined outside of North America. Recent critiques on the epistemology of mainstream sport psychology strongly support the inclusion of culture as a meaningful category (Dewar & Horn, 1992; Duda & Allison, 1990). Duda and Allison (1990), for example, suggest that ignorance of the possible impact of sociocultural factors on psychological processes in sport and exercise limits the possibility of universal application of the findings.

Cross-cultural research has focused on comparison of behavioral phenomena, with little attention to theoretical implications. Betancourt and Lopez (1993) argue for incorporating cultural factors within the framework of theory. With regard to the theoretical focus on cross-cultural research, Betancourt and Lopez (1993) suggest a bottom-up approach and a top-down approach to facilitate the study of cultural influence. The bottom-up approach begins with a specific phenomenon observed in a culture and applies it cross-culturally to find its implications for theory. For example, the cultural variations of collectivism versus individualism can be measured across cultures. Then, similarities and differences in the relationships between the collectivism—individualism dimension and other variables of interest (e.g., coaching behavior) may serve as bases for theoretical accounts. In the top-down model, one begins with theory, which typically ignores cultural aspects, and moves to specific cultures to examine cultural influences. If the proposed relationships in a theory are observed in other cultures, the theory is believed to have cross-cultural generality. The primary role of the top-down approach is to discover the universal predictions of theory.

The top-down approach is adapted to the present study. Specifically, this study began with the predictions of the goal perspective theory, which typically ignores cultural influence, and investigated the cultural impact on the relationships between goal orientation and its psychological correlates within a specific culture (i.e., Korean youth sport setting). Korean culture, like most other countries in Asia, is represented by interdependence and hierarchy among group members (see Moy, 1992). For Koreans, group identity and modesty are given greater importance than individual identity and self-expressiveness. In contrast, the dominant North American cultures tend to place high value on independence and horizontal relationship. These differences in the dominant cultural values might lead to limited generalizability of the goal perspective theory in Korean youth sport. Sufficient evidence for the expected relationships, however, would suggest that the theory holds cross-cultural applicability.

The purpose of this study was twofold. First, this study examined the cross- cultural generality of goal perspective theory, specifically looking at whether the anticipated relationships between goal orientation and the indices of intrinsic motivation hold true in Korean youth sport. Second, this study was concerned with the influence of gender and grade level on goal orientation and intrinsic motivation.

Several hypotheses were made on the basis of achievement goal perspective theory (Duda, 1992; Nicholls, 1989) and previous findings in sport and physical education settings. Consistent with previous classroom and sport studies (Duda, 1992; Duda et al., 1995; Nicholls, 1989), an association between task orientation and

overall intrinsic motivation was predicted. The dimensions of intrinsic motivation (Devi & Ryan, 1985)— namely, perceptions of enjoyment, effort, and competence—would be positively related to task orientation in sport. However, no specific relationships between ego orientation and the self-perceptions were predicted, because perceptions of ego-oriented individuals would depend on their feelings of ability. It was also hypothesized that higher scores on task orientation would be associated with lower anxiety and tension. On the other hand, ego-oriented individuals would report greater anxiety in sport.

Drawing from early and recent findings regarding gender differences in goal orientation (Gill, 1986; White & Duda, 1994), it was hypothesized that female athletes would be higher on task orientation, whereas male athletes would score higher on ego orientation. In addition, the literature on gender and sport involvement suggests that males tend to perceive themselves as more able than females in sport and demonstrate greater enjoyment (Eccles & Harold, 1991). Accordingly, it was hypothesized that male athletes would be more likely than female athletes to have greater perception of ability in sport and experience greater intrinsic interest.

A greater number of older children identify themselves as potential dropouts than do young children (Weiss, 1993). Athletes in higher grades are more likely than those in lower grades to have interests and responsibilities other than sports. Consequently, it was predicted that athletes in lower grades would score higher in task orientation, intrinsic motivation, and enjoyment. No interaction effects of genderand grade level were hypothesized because of insufficient findings with previous studies in this area.

In sum, this study was primarily concerned with the potential generality of goal perspective theory within an Eastern culture. Adequate evidence for the hypothesized relationships between goal orientation and its correlates found in the specific cultural context would suggest cross-cultural applicability of goal perspective theory. Gender influences on goal orientation and grade differences in task orientation and intrinsic motivation were expected. Task orientation, consistent with mainstream findings, was predicted to positively correlate with enjoyment, perceived competence, and effort.

Method

Participants

A total of 344 middle school athletes (244 males, 90 females), representing 17 schools in Seoul, participated in this study. The athletes were intensively involved in a wide range of interscholastic sport programs such as badminton, basketball, baseball, field hockey, shooting, taekwondo, tennis, track and field, and wrestling. The sample consisted of almost equal number of first (n = 111), second (n = 105), and third graders (n = 118). Grades 1, 2, and 3 in middle school in Korea are equivalent to Grades 6, 7, and 8 in America. The mean age of the participants was 13.94 (SD = 0.92, range = 12 to 18).

Demographic data revealed that the athletes had been participating in their specific sports for an average of 2.58 years (SD = 1.51, range = 1 to 9). Frequency of participation was far greater than expected. The mean number of days of practice per week was 5.99 (SD = .74, range = 1 to 7), indicating that they participated in their sports almost every day except Sunday. The average amount of time spent in practice per week was about 28 hours and varied considerably (SD = 9.46, range = 4 to 56). The mean days and time spent in practice per week suggest that the athletes spent about 4.7 hours per practice day.

Measures

The questionnaire used in this study included three sections: (a) demographic information, (b) Korean language version of the Task and Ego Orientation in Sport Questionnaire (TEOSQ); and (c) Korean language version of the Intrinsic Motivation Inventory (IMI).

Demographic Information. Demographic information included participant's age, gender, grade, number of years involved in the specific sport, practice days per week, and practice hours per week. This section provided general information regarding intensity and frequency of school-based sport programs in Korea.

Korean Language Version of the TEOSQ. Each participant's goal orientation was assessed using Korean version of the TEOSQ (Duda, 1992). The original TEOSQ has 13 items and assesses the extent to which an individual defines success in terms of mastery and outperforming others. Specifically, 7 items reflect task orientation (e.g., "I feel most successful in sport when I learn a new skill and it makes me want to practice more"), and the other 6 items reflect ego orientation to sport success (e.g., "I feel mOSt successful in sport when I can do better than my friends"). Responses to each item were recorded on a 5-point Likert-type scale ranging from *strongly disagree* (1) to *strongly agree* (5). Duda and her colleagues (Chi & Duda, 1995; Duda, Olson, & Templin, 1991) have demonstrated the high internal consistency of the original task and ego scales (a = .71 to .86 and .79 to .90, respectively).

The development of the Korean version of the TEOSQ followed translation and back-translation procedures. First, the original English version of the TEOSQ was translated into Korean by the first author, who is familiar with the goal perspective theory. Then, two other bilingual scholars were asked to translate the scale back into English without referring to the original scale. A committee, consisting of the first author and two scholars who were involved in back-translation, examined each item from both the original and the back-translated versions. When the back-translated item appropriately represented the original English item, the translated item was considered adequate. In cases where the back-translation was not consistent with the original item, the committee discussed the item to find an appropriate translation. Finally, two middle school teachers were invited to review the preliminary Korean version of the TEOSQ. In this stage, they evaluated the readability of the items for middle-school-aged athletes. The suggestions from the teachers led to minor changes in wording and format of the scale.

Korean Language Version of the IMI. The Korean language version of the IMI was used to assess overall intrinsic motivation. The original IMI was developed by Ryan (1982) as a measure of underlying dimensions of intrinsic motivation. McAuley et al. (1989) demonstrated evidence of the construct validity of an 18-item sport specific version of the IMI. McAuley et al.'s version was constructed to measure four dimensions of intrinsic motivation: Enjoyment/Interest (e.g., "Playing my sport is fun"), Effort/Importance (e.g., "I put a lot of effort into playing my sport"), Perceived Competence (e.g., "I think I am pretty good at my sport"), and Pressure/Tension (e.g., "I feel tense while playing my sport"). The four subscales have demonstrated acceptable reliability coefficients of .78 for Enjoyment/Interest, .80 for Perceived Competence, .84 for Effort/Importance, and .68 for Pressure/ Tension in male and female undergraduate students (McAuley et al., 1989).

The development of the Korean version of the IMI involved the same procedures of translation and back-translation used for the development of the Korean version of the TEOSQ. The original IMI was translated into Korean by the author and back-translated into English without reference to the original items by the same scholars involved in back-translation of the TEOSQ. Readability of each item was evaluated by the same middle school teachers. Appropriate modifications to format, wording of the items, and the scale instruction were followed to maintain conceptual equivalence of the measure. The 7-point Likert-type scale ranging from *strongly disagree* (1) to *strongly agree* (7) remained the same.

Procedure

Permission to collect data with the athletes was received from school administrators. Team coaches and physical education teachers who agreed to participate in this project provided a classroom space to administer the questionnaire, and then they left the classroom immediately. The athletes were told that participation was voluntary and their responses would be confidential. They were encouraged to answer the items as honestly as possible. The first author was available to answer any questions posed by the athletes. Most of the athletes could complete the questionnaire within 25 minutes.

Results

Factor Structure and Reliability

The Korean versions of the TEOSQ and the IMI used in the following analyses were based on the results of a series of exploratory and confirmatory factor analyses (CFAs). A principal components analysis with a varimax

rotation was performed on the translated version of the TEOSQ. Three factors emerged having eigenvalues greater than 1.00 and accounting for 50% of the variance. Two items ("I'm the only one who can do the play or skill" [Item 1] and "The others can't do as well as me" [Item 4]) achieved a loading greater than .40 on more than one factor. The first factor, which accounted for 26% of the variance, included six task orientation items. The second factor consisted of four ego orientation items, accounting for 15% of the variance. The third factor consisted of only one item ("I learn something that is fun to do" [Item 5]), with a loading greater than .40.

A series of CFAs were performed with the LISREL 7 statistical package (Jöreskog & Sörbom, 1989) using the maximum likelihood estimation procedure to assess the factorial validity of the TEOSQ. Consistent with general practice in structural equation modeling (SEM) procedures, two alternative models, as well as an a priori specified model, were tested. In the first CFA, all 13 TEOSQ items were assigned to one of the two original TEOSQ factors, Task or Ego. In the second analysis, a single-factor model was tested. Lastly, drawing on the results of exploratory factor analysis, a modified two-factor model was tested. In this modified model, two items loaded on more than one factor and the one item loaded on the third factor were dropped.

The upper portion of Table 1 represents values of goodness of fit from CFAs for the three models of the TEOSQ. All chi-square statistics were significant (p < .001), suggesting that the data did not fit the proposed models. However, it is recognized that chi-square statistics can be inappropriate because of their sensitivity to sample size (Bollen & Long, 1992). The chi-square/degrees of freedom ratio also provides an indication of goodness or badness of fit; ratios between 2 and 5 reflect reasonably good fit (Byrne, 1989). The goodness of fit index (GFI) and the adjusted goodness of fit index (AGFI) range from 0 to 1, with a value above .90 indicating a good fit and below .80 a poor fit (Smith, Smoll, & Schutz, 1990). Values for the root mean square residual (RMSR) between .05 and .10 are considered acceptable (McAuley et al., 1989). As can be seen in Table 1, the 10-item two-factor model was found to provide a better fit to the data than the other models on the basis of the overall fit indices. Consequently, the 10-item two-factor model was retained for the subsequent analyses. The 10-item version of the TEOSQ showed Cronbach's alpha coefficients of .75 for task orientation and .67 for ego orientation.

An exploratory principal components analysis on the IMI yielded five factors having eigenvalues greater than 1.00 and accounting for 62% of the variance. The first factor, which accounted for 27% of the variance, consisted of all of the original Interest items. The second factor consisted of five items of the original Perceived Competence subscale. It accounted for 12% of the variance. The third factor, which accounted for 9% of the variance, included three items regarding effort in sport. The fourth factor consisted of three items on tension and pressure. The final factor included two items ("It is important to me to do well in my sport" [Item 4] and "I am very relaxed while playing games" [Item 15]).

Table 1 Goodness-of-Fit Indices of Modes Tests for the Task and Ego Orientation in Sport Questionnaire (TEOSQ) and the Intrinsic Motivation Inventory (IMI)

Model	Items	χ^2	df	χ^2/df	<i>p</i> <	GFI	AGFI	RMSR
TEOSQ					- **			7
Two-factor	13	175.22	64	2.74	.001	.923	.891	.065
Single-factor	13	328.52	65	5.05	.001	.835	.769	.100
Modified two-factor	10	68.91	34	2.03	.001	.960	.936	.045
IMI				•				
Four-factor	18	388.58	129	3.01	.001	.890	.854	.118
Single-factor	18	935.60	135	6.93	.001	.719	.645	.237
Modified three-factor	13	168.76	62	2.72	.001	.928	.894	.112

Note. The TEOSQ modified two-factor model excluded Items 1 and 4 from ego orientation and Item 5 from task orientation. The IMI modified three-factor model excluded the Tension/Pressure subscale and Item 4 from the Effort/Importance subscale. GFI = goodness-of-fit index. AGFI = adjusted goodness-of-fit index. RMSR = root mean square residual.

CFAs were performed with the LISREL 7 program on three competing models of the IMI. The first model represented the original four-factor model suggested by McAuley et al. (1989). The second model represented a single-factor model. Finally, a modified three-factor model, consisting of 13 items, was specified on the basis of item analysis and reliability analysis. The modified model excluded the Pressure/Tension subscale and one item from the Effort/Importance subscale. The Pressure/Tension subscale demonstrated inadequate reliability (a = .57 for four items, a = .62 without Item 15). In addition, correlation coefficients between the Pressure/Tension subscale items and the overall IMI score were relatively low and often negative, ranging from .07 to —.35. One item from the Effort/Importance (i.e., "It is important to me to do well in sport and games") was deleted because of low interitem correlations. All other subscales of the IMI achieved adequate reliability coefficients (alphas ranged from .72 to .80). Elimination of the Tension/ Pressure subscale and one item from the Effort/Importance subscale improved the overall IMI reliability coefficient to .83.

The results of the CFAs on the three models of the IMI are presented in the lower portion of Table 1. All chi-square goodness of fit values are significant, suggesting that the data do not fit the hypothesized models. The fit indices for the four-factor and the single-factor models were not in the desired range. Overall fit indices indicated that the support for the modified three-factor structure was marginal, but better than the four-factor structure. Therefore, it was decided to retain the modified 13-item model and use it in the subsequent analyses. Subsequent interpretation of the results should be viewed with caution because the CFAs did not provide strong support for the IMI factor structure.

Table 2 Means, Standard Deviations, and Ranges of the Scores for all Variables

•	M	fale Female		To	tal		
Variable	M	SD	M	SD	M	SD	Range
TEOSQ							
Task orientation	4.01	0.58	4.01	0.55	3.96	0.54	2.0 - 5.0
Ego orientation	3.59	0. 73	3.48	0.76	3.46	0.63	1.0 - 5.0
IMI							
Total IMI	4.79	0.82	4.55	0.77	4.72	0. 81	2.2-6.5
Enjoyment/interest	5.31	1.15	5.31	1.08	5.31	1.13	1.0-7.0
Perceived competence	4.20	1.01	3.79	0.58	4.09	1.01	1.4-6.6
Effort/importance	5.20	0.90	4.93	0.88	4.79	1.06	1.0-7.0

Note. TEOSQ = Task and Ego Orientation in Sport Questionnaire. IMI = Intrinsic Motivation Inventory. The IMI does not include the Tension/Pressure subscale and one item from the Effort/Importance subscale.

Table 3 Correlations Between the Variables

Variable	1	2	3	4	5
1. Task orientation		.28**	.39**	.25**	.37**
2. Ego orientation		· —	.14*	.35**	.19**
3. IMI enjoy/interest			-	.27**	.40**
4. IMI perceived competence					.42**
5. IMI effort/import					

Note. IMI = Intrinsic Motivation Inventory.

Means and Correlations

As shown in Table 2, Korean young athletes scored moderately high on both task (M = 3.96) and ego (M = 3.46) orientations. The means for males and females on task and ego orientations are very similar. An examinations of the means for the IMI subscales also revealed that both males and females reported moderately high scores.

Zero-order correlations were calculated to examine the relationships among the variables used in the current investigation (Table 3). Interestingly, task orientation was pOSitively correlated with ego orientation, indicating that the two orientations might not be completely independent. Task orientation was positively associated with intrinsic interest, perceived competence, and effort. In contrast to the prediction of the mainstream literature (Duda, 1992; Duda et al., 1995), an emphasis on ego orientation corresponded to the indices of intrinsic motivation (r = .14 to .35).

Gender and Grade Differences

Two 2 x 3 (Gender x Grade) MANOVAs were conducted to determine whether there were gender and grade differences in goal orientation and intrinsic motivation. Standardized discriminant coefficients, univariate F values, and eta- squares for significant multivariate effects are shown in Table 4. The multivariate analysis with task orientation, ego orientation, and three indices of intrinsic motivation as dependent variables revealed a statistically significant main effect for gender, Wilks's A = .94, F(5, 324) = 4.35, p < .01. The follow-up univariate F tests and the discriminant function coefficients suggested that the two dimensions of intrinsic motivation (i.e., perceived competence and effort) were identified as the contributors to gender differences. Specifically, male athletes scored higher on perceived competence (M = 4.20) and effort (M = 4.88) than

^{*}p < .05. **p < .01.

female athletes (M = 3.79 and 4.56, respectively). However, the eta-squares of .03 and .04 for gender differences in perceived competence and effort suggest that the strength of gender difference is minimal. The main effect of grade was also statistically significant, Wilks's A = .93, F(10, 648) = 2.56, p < .01. Examination of the univariate Fs and the standardized discriminant function coefficients revealed that perceived competence contributed most to grade differences. The univariate F tests indicated that athletes in their 1st year (M = 4.36) reported higher perceived competence than those in their 2nd (M = 4.00) or 3rd year (M = 3.92), F(2, 328) = 7.77, p < .01. The interaction effect of gender and grade was not statistically significant at the .05 level.

Goal Orientation and Its Correlates

One of the primary interests in this study was to determine whether the predicted relationships between goal orientation and its correlates hold true in Korean youth sport. Two canonical correlation analyses were conducted for males and females separately with task and ego orientations as the set of predictor variables, and the subscales of the IMI as the set of criterion variables. First, the overall multivariate relationship between the two goal orientations and the three IMI di-

Table 4 Standard Discrimination Function Coefficients Univariate F Values, and Eta-Squares for Gender Main Effects

Variable	Standard discriminant function coefficient	Univariate F	η^2
Task orientation	.26	.04	.00
Ego orientation	13	2.37	.01
IMI enjoy/interest	.34	0.00	.00
IMI perceived competence	73	15.28**	.04
IMI effort/importance	57	8.86*	.03

Note. IMI = Intrinsic Motivation Inventory.

Table 5 Canonical Analysis Between Goal Orientation and Subscales of Intrinsic Motivation

	Standard canonical coefficient				
Variable	Male	Female			
Goal orientation					
Task orientation	.87	.92			
Ego orientation	.30	.31			
IMI subscales					
Enjoyment/interest	.60	.25			
Perceived competence	.33	.35			
Effort/importance	.38	.69			

Note. IMI = Intrinsic Motivation Inventory.

mensions resulted in one significant function for male athletes, Wilks's A = .70, F(6, 478) = 15.45, p < .001, canonical correlation = .49. The canonical loadings greater than or equal to .30 were assumed to make significant contribution to the multivariate relationship (Pedhazur, 1982).

As shown in Table 5, the loadings for male athletes indicated that both task (.87) and ego (.30) orientations made significant contribution to the multivariate relationships. All subscales of the IMI contributed to the multivariate relationship. Therefore, higher scores on task and ego orientations were associated with greater perceived enjoyment, competence, and effort for male athletes. Redundancy analysis revealed that a total of

^{*}p < .05. **p < .001.

14.6% of the variance in the IMI subscales was explained by the two goal orientations. Generally, a total minimum redundancy value of 10% can be considered significant and meaningful (Pedhazur, 1982).

One significant canonical function also emerged for female athletes, Wilks's A = .68, F(6, 170) = 6.14, p < .001, canonical correlation = .50. Examination of the canonical loadings shown in Table 5 suggested that task (.92) and ego (.31) orientations, effort (.69), and perceived competence (.35) were the variables that made significant contribution to the multivariate relationship. Specifically, higher scores on task orientation, in particular, corresponded to greater effort and perceived competence in sports. The redundancy value was 13.3%, indicating that the task and ego orientations accounted for about 13% of the variance in the set of criterion variables.

Discussion

This study examined whether the predictions of goal perspective theory can be replicated within Korean youth sport. Following Betancourt and Lopez's (1993) suggestion, the top-down approach to cultural influence was applied. Specifically, this study began with the goal perspective theory, which ignores cultural variations, and examined cross-cultural generality of the theory by assessing the relationships between goal orientations and intrinsic motivation in Korean youth sport.

Evidence for the anticipated relationship would suggest that this portion of the theory has cross-cultural generality. Psychometric properties of the translated measures of goal orientation and intrinsic motivation were examined. In addition, gender and grade level were included as independent variables to determine their influences on goal orientation and intrinsic motivation.

Use of both exploratory and confirmatory factor analytic procedures allowed the researchers to test cross-cultural robustness of the factor structure of the translated versions of the TEOSQ and the IMI. The CFAs indicated that the two-factor model of the TEOSQ and the four-factor model of the IMI, which demonstrated strong factor structures in North America, did not fit the data well. The modified two-factor model of the TEOSQ (10 items) was more appropriate than the other models. The 13-item three-factor model of the IMI provided a better fit than the four-factor and the single-factor model, albeit with marginal support for the three-factor version. Taken together, these findings from the CFAs suggest that factor structures of the measures demonstrated in North America were not identical in Korea, highlighting the need for cross-cultural validation of research measures.

Interestingly, a positive and significant correlation between task and ego orientations was found in this study. The positive association between task and ego orientations suggests that the youngsters do not necessarily use a single criterion to evaluate their success in sports. The young athletes tended to allow multiple criteria for the judgment of success in sports, including both personal improvement and the demonstration of superiority. This finding is not consistent with majority of previous mainstream studies (e.g., Duda, 1992; Duda & Nicholls, 1992). However, similar interdependence between task and ego orientations was recently reported (Horn, Duda, & Miller, 1993).

The current study was primarily concerned with the replication of the anticipated relationships between the two goal orientations and some indices of intrinsic motivation in a Korean youth sport setting. The multivariate analyses demonstrated evidence for both universality and cultural specificity of the goal perspective theory. The results concerning the multivariate relationships between task and ego orientations and the three indices of intrinsic motivation were partially consistent with the predictions of the goal perspective theory. Task orientation was significantly associated with three dimensions of intrinsic motivation (i.e., Enjoyment/Interest, Perceived Competence, and Effort/Importance) for male athletes, and with Effort/ Importance and Enjoyment/Interest dimensions for female athletes. However, no inverse association between ego orientation and the indices of intrinsic motivation was found. Simple correlations and multivariate analyses altogether suggest that both task and ego orientations correspond to enjoyment and interest in sport, although task orientation had a stronger relationship.

Perhaps the unique nature of school sport system in Korea might provide explanations for this finding. This study employed a sample of middle school athletes who were intensively involved in sports. The Korean young athletes were participating at the interscholastic level, spending about 28 hours in practice weekly. A considerable number of the young athletes participate in sports as an alternative way to enter high school and college. Because they are expected to compete with other athletes and keep the best possible ranking to get a limited number of admissions from high school and college, demonstration of superiority is frequently encouraged by the reward system. Thus, not only is personal improvement encouraged, but also team or individual standing is constantly evaluated. Consequently, it was not surprising that ego orientation as well as task orientation was associated with the dimensions of intrinsic motivation.

Predicted gender differences in goal orientation was not supported, with males and females similar on task and ego orientations. This finding suggests that the middle-school-aged male and female athletes in Korea might employ similar criteria to assess their performance success in sports. Previous literature, in contrast to the current result, found gender influence on conception of ability (Nicholls, 1984). That is, males prefer a more differentiated conception of ability, while females tend to perceive ability as less differentiated and thus emphasize personal effort. Future research might assess how conception of ability is mediated by gender in Korean culture.

The results from the relationships between goal orientations and intrinsic motivation confirmed the adaptive nature of task orientation. Congruent with the hypothesis, high task-oriented athletes reported that they worked hard in practice and competition and experienced greater enjoyment. Ego orientation was also significantly related to scores on enjoyment, perceived competence, and effort. However, the relative efficacy of task orientation as evidenced in the multivariate analyses should not be ignored. Task orientation was more strongly related to the dimensions of intrinsic motivation.

In sum, the current study progressed from mainstream goal perspective theory to examine cross-cultural generality of the theory. The findings overall provided moderate support for the predicted relationships between goal orientations and sport-related experience. Evidence from simple correlations and multivariate analyses indicated the link between task orientation and adaptive motivational processes, suggesting that some aspects of the theory have cross-cultural generality. The finding that ego orientation was not detrimental to overall intrinsic motivation might suggest cultural specificity. The results from this study have limited merit in explaining how the culture interposes the relationship between goal orientation and motivational processes. Incorporation of direct measures of cultural variables (e.g., individualism versus collectivism) *would* provide relevant cultural elements that influence goal orientation and its relationships to motivational variables. This study demonstrated the need for understanding culture and its role in facilitating the development of more universal theories and principles in sport and exercise psychology.

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