Validation of the Korean Version of the Locus of Evaluation Inventory[*]

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This study, undertaken with college students (N = 244, 63.1% female), validated the Locus of Evaluation Inventory (LEI; Bucur & Lee, 2006) in Korean culture, using exploratory factor analysis (EFA) and examined the correlations between the locus of evaluation and psychological adjustment (self-esteem, presentation anxiety, and social anxiety). The EFA results yielded a 17-item Korean LEI with five factors. Four factors (low self-regard, concerns for others' opinion, dependence, and public self-consciousness) were almost identical with those found in the U.S. Additionally, a new factor (show-off) emerged, which seems to reflect a Korean-specific strategy to protect the vulnerable self. Correlation results, with measures of self-esteem and anxiety, supported both the convergent and concurrent validity of the Korean LEI, further suggesting the utility of this scale for use in Korea.

Key words : Locus of Evaluation, Locus of Evaluation Inventory, self-esteem, presentation anxiety, social anxiety

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It is well documented that others' feedback and societal expectations have a profound influence on the construction and modification of one's self-concept and self-appraisal (Goffman, 1959; Gollwitzer, 1986). This is because individuals' self is a product and reflection of social life (James, 1890). The essence is that the self cannot be separated from social influences, and a group of scholars known as symbolic interactionists (e.g., Blumer, 1969) has focused on one's perception of the self which is believed to be construed through others' appraisal or judgment on one's personality. At the center of this viewpoint are the research topics such as 'looking glass self' (Cooley, 1902; Mead, 1934), 'reflected self' (James, 1890; Neisser, 1993), and contingencies of self-worth (Crocker & Wolfe, 2001). Although post symbolic interactionists found some evidence that people's appraisal of how they are perceived by others are based on their own views rather than on the understanding of how others actually see them (Shrauger & Schoeneman, 1979; Kenny & Depaulo, 1993), social context still plays a pivotal role in the initial development of one's self-concepts in reference to significant others and in facilitating one's continuous self-regulation (Suh, 2000).

Since humans, by nature, have a strong need to belong to and get connected with others, they vigilantly focus on various social cues emitted by others (Baumeister & Leary, 1995; MacDonald & Leary, 2005). However, a considerable amount of research on self-worth has consistently demonstrated that others' appraisal of one's self incur various mental health problems (Bakan, 1966; Diehl, Owen, & Youngblade, 2004). For example, several studies documented that being excessively sensitive to others' appraisal and one's effort to seek social sources for self-worth lead to negative health outcomes and psychological distress including depression and unhappiness (Butler, Hokanson, & Flynn, 1994; Kernis & Goldman, 2003). Conversely, people who have internal standards and focus on self-referent information tend to maintain favorable views about the self, which can play a crucial role in feeling happiness (Alicke, Klotz, Breitenbecher, & Vredenburg, 1995; Kruger, 1999).

In the counseling context, Carl Rogers paid attention to the positive relationship between the self-regard based on one's inner voice and positive counseling outcomes. He postulated the construct of Locus of Evaluation (LOE) as a key variable affecting an individual's self-esteem and psychological adjustment (Rogers, 1959; Raskin & Rogers, 2000). LOE is defined as "the extent to which [one's] values and standards depend upon the judgments and expectations of others, or are based on a reliance upon [one's] own experience" (Rogers, 1951, p. 156). It is conceptualized that an individual with internal LOE places him/herself into the center of the valuing process. With the external LOE, on the contrary, the feedback and/or judgment

generated from others becomes the criterion of value for the self. Rogers (1959) believed that an internal LOE is positively related to psychological health. Through his clinical experiences, Rogers repeatedly observed that the majority of clients who experience psychological distress tended to have low self-esteem and external LOE. By external LOE, he meant that clients often come to counseling preoccupied with what others might think of them; the agency of judging and valuing one's self-regard was other people. Clients are typically experiencing conditional regard, which means that their self-worth and self-regard heavily depend on the extent to which they satisfy the conditions of worth imposed by others (Rogers, 1951). As counseling progressed, clients are able to shift the basis of their standards and values from other people (external) to themselves (internal), which leads to a more positive view of one's self (Raskin, 1952). In essence, the shift of the LOE from external to internal is a key to building healthy self-regards and an important goal of counseling toward achieving a more fully-functioning self.

A successful application of LOE to counseling practice necessitates a sound measure of the construct. Although several scales of LOE (e.g., Children's Locus of Evaluation and Control Scale and Adult Locus of Evaluation and Control Scale: Miller, 1963; Locus of Evaluation measure: Cline, 1975) had been developed, two major issues were identified: (a) empirical validation of

these scales had been lacking for practical use, and (b) these scales were limited due to their lack of theoretical basis in item development. To overcome these limitations, Bucur and Lee (2006) developed a 34-item Locus of Evaluation Inventory (LEI) whose items are mostly drawn from the counseling cases of Rogers and Raskin, major figures in the person-centered approach. An exploratory factor analysis on the scale with 603 (55.6% male) American college students yielded 25 finalized items with four distinctive factors: (a) Low Self-Regard, (b) Concern for Others' Opinion, (c) Dependence, and (d) Public Self-Consciousness. Significant positive correlations were found between the external LOE measured by the LEI total score and neuroticism ($r =$ .63) and procrastination ($r = .30$), whereas negative correlations between external LOE and self-esteem ($r = -.59$) as well as conscientiousness ($r = -.23$) (Bucur & Lee, 2006).

Although the study by Bucur and Lee (2006) that developed and validated the LEI paved the way for the understanding and application of LOE, it is equivocal whether the construct of LOE is applicable in a culture other than the Western culture (e.g., Korean culture) given that the construct of self and its appraisal must be culture-bound. For instance, the Asian perception of self is typically represented as 'interdependent self' (Hall, 1966; Ho, 1998; Markus & Kitayama, 1991), which designates the characteristic of assuring and maintaining the self

through interaction with others as a group rather than being independent. In Asian culture, the reactions and evaluations by others are the most decisive standard. Personal inferences and evaluations are regarded as more important source of self evaluation in Western, perceptions of how well one meets the standard and feedback from others are more important in Asian culture. Asians' tendency to be more mutually dependent on one another may open a room for LOE to work differently in Asian culture and western culture.

Particularly, since the interdependence involves relational concerns, social anxiety is prevalent and frequently appears in Asian culture. In Korean culture where collectivism and Confucianism are salient, clients typically report difficulties in relationships and suffer from various anxiety symptoms (Choi & Kim, 1999). Saving face for family and interpersonal harmony are valued in Korea, thereby adding pressure for Koreans to be extremely sensitive to others' perception and judgment. For example, Koreans are socialized to develop 'Nunchi' (Choi & Kim, 1999), an ability to be attuned to others' thoughts and feelings. Furthermore, 'Chemyun' which expresses the superior self images than actual self is considered a social skill (Lee & Park, 1990; Kim, Kim, Park, & Lee, 1991). Therefore, a more direct empirical validation of the LEI is called for in order to understand the construct of LOE in Korea culture.

This study aimed to validate the LEI in Korean culture using an exploratory factor analysis (EFA) and the correlation analyses with self-esteem and psychological adjustment indices. Given that many Korean clients report difficulties in interpersonal relationships and academic/work performance due to elevated levels of anxiety (Cho, 2004), the relationship between the Korean version of the LEI and measures of anxiety were examined. In an effort to provide estimates of both convergent and concurrent validity, a negative correlation with self-esteem and positive correlations with anxiety were hypothesized. It is expected that the validation of the LEI in Korea would not only further validate the psychometric properties of the LEI developed in the United States, but also increase our understanding of how LOE works in Korean culture.

Method

Participants

The participants of this study were 244 college students (63.1% female) recruited from two major universities in Korea. The age of the participants ranged from 18 to 30 years, with a mean of 22.17 years.

Procedure

All participants completed the research packet

including: (a) the Locus of Evaluation Inventory (Bucur & Lee, 2006), (b) Rosenberg Self-Esteem (Rosenberg, 1965), (c) Personal Report of Confidence as a Speaker (Paul, 1996), and (d) Social Interaction Anxiety Scale (Mattick & Clarke, 1998). An EFA along with parallel analysis (Horn, 1965) on the 25-item LEI as well as correlation analyses among variables of interest were conducted.

Measures

The Korean Version of the Locus of Evaluation Inventory (K-LEI)

The Locus of Evaluation Inventory (LEI: Bucur & Lee, 2006) was translated into Korean by the authors and was used to measure the degree to which an individual evaluates or judges the self based on internal (i.e., within the self) or external (i.e., outside of the self) perceptions, standards, or values. The LEI (English version) consists of 25 items (22 positively worded and 3 negatively worded) with four factors: (a) Factor 1 (Low Self-Regard: LSR), which reflects general negative self-appraisal, and a greater willingness to accept and internalize positive or negative feedback from others' than from oneself (e.g., "It is hard for me to accept positive feedback from myself"); (b) Factor 2 (Concern for Others' Opinion: COO) reflects an individual's concern over how one is perceived by others (e.g., "I often think about my appearance"); (c) Factor 3 (Dependence: D)

concerns one's reliance on external sources to dictate self-behavior (e.g., "I often rely on others to tell me what to do"); and (d) Factor 4 (Public Self-Consciousness: PSC) designed to measure how the degree of attention given toward the self as a social object influences behavior and emotion when in public (e.g., "I find it hard to act like myself when others are around"). Participants indicated on a 6-point Likert-type scale (1 = *strongly disagree* and 6 = *strongly agree*) how much they agree with each item. Higher scores indicate an external LOE and lower scores reflect an internal LOE. The internal consistency estimates for the LEI total was .88 and the test-retest reliability coefficient with a 2-week interval was .81. The Cronbach alpha coefficient for the current study was .80.

Rosenberg Self-Esteem Inventory (RSE)

Self-esteem was assessed with RSE (Rosenberg, 1965). This scale consists of 10 items and has been demonstrated in numerous studies as the most widely used measure of global self-esteem (Blascovich & Tomaka, 1991). Participants were asked to rate the degree to which they agree or disagree with each item such as "On the whole, I am satisfied with myself" using a 4-point Likert-type scale (1 = *strongly disagree* to 4 = *strongly agree*). High score indicates high self-esteem. RSE has high internal consistency and test-retest reliability. For example, Fleming and Courtney (1984) reported a coefficient alpha of .88, test-retest reliability of .85 across a

two-week interval, and sufficient convergent and discriminant validity (i.e., .78 with general self-regard and .01 with grade point average, respectively). Lee (1993) who translated the RSE in Korean reported good range of alpha coefficients (.80 to .83) for the scale. The coefficient alpha for the current study was .85.

Personal Report of Confidence as a Speaker (PRCS)

The PRCS (Paul, 1996) translated in Korean (Cho, 2004) was used. Paul's PRCS is commonly referred to a measure of speech anxiety or audience anxiety. It consists of 30 items that assess cognitive, affective, and behavioral reactions in public speaking situations scored on a 5-point Likert-type scale (1 = *strongly disagree* to 5 = *strongly agree*). Sample items include "I am in constant fear of forgetting my speech" and "My hands tremble when I try to handle objects on the performance." The alpha coefficient was reported as .91, the test-retest reliability across an entire semester was .61 (Daly, 1978). This scale correlates well with many related measures such as Audience Anxiousness (r = .84) and the Interaction Anxiousness (r = .63) (Leary, 1983; Paul, 1996). The coefficient alpha for the current study was .94.

Social Interaction Anxiety Scale (SIAS)

The SIAS (Mattick & Clarke, 1998) consists of 20 items measuring interpersonal anxiety on 5-point Likert-type scale (1 = *strongly disagree* to 5 = *strongly agree*). Sample items include, "I am nervous mixing with people I don't know well," "I worry about expressing myself in case I appear awkward." The test-retest reliability across 12 weeks was .92 and convergent validity by correlations with other measures was reported, such as Social Avoidance and Distress Scale (r = .74) and Social Phobia Scale (r = .72) (see Mattick & Clarke, 1998). The SIAS translated and validated in Korean was used for the current study (Kim, 2000). Kim (2000) reported an internal consistency of .92, and the alpha coefficient for the current study was .91.

Results

Exploratory Factor Analysis

A principal axis factoring analysis with promax rotation[1] in SPSS 12.0 was conducted on the 25-item of the K-LEI to estimate the number of factors. The scree plot, parallel analysis, and factor interpretability were considered when

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1) Promax rotation is one type of oblique rotation. Oblique rotation over orthogonal rotation (e.g., Varimax) was used in this study because it has good reasons to believe that the subfactors of the LEI are considerably inter-correlated as per the results from Bucur and Lee(2006). Tabachnick and Fidell(2001) suggested that oblique rotation be used in presence of high correlations among factors.

determining the number of factors to retain. The scree plot showed that the slope begins to run horizontal below the fifth factor. However, due to its subjective nature (Zwick & Velicer, 1982), three- to six-factor solutions were carefully examined. Another approach used to determine the accurate number of factors to retain is called parallel analysis (PA). This concerns the comparison of the eigenvalues obtained from the sample with those expected from multiple random samples (O'Connor, 2000). The logic behind PA is that only the factors whose eigenvalues are greater than the average eigenvalues from multiple random samples[2] can be claimed as 'true factors' (i.e., not extracted by chance). PA is suggested to be robust to sampling errors, which can cause problematic overestimation of factors when the Kaiser rule (i.e., eigenvalue greater than 1, Kaiser, 1960) or scree tests are used. PA is known to be one of the most accurate ways of factor retention (Zwick & Velicer, 1986; Velicer, Eaton, & Fava, 2000). Along with the scree test, the result of parallel analysis supported the five-factor solution (see Table 1). Note in Table 1 that from the 6th factor, the actual eigenvalue, extracted from the study data, is smaller than the average eigenvalue of the 50 random samples. This means that the five factors whose eigenvalues are

Table 1. Parallel Analysis

Factor	Actual Eigenvalue	Average Eigenvalue	95th Percentile Eigenvalue
1	5.838	1.639	1.725
2	2.130	1.539	1.613
3	1.648	1.451	1.510
4	1.491	1.393	1.443
5	1.436	1.333	1.380
6	1.206	1.280	1.323
7	1.038	1.227	1.269

Note. Seven of 50 actual, average, and 95th percentile eigenvalues provided.

greater than the average eigenvalues from the random samples are robust to chance or random errors. Taken together, a five-factor solution was deemed the most conceptually and statistically appropriate.

Once a five-factor model was established, in accordance with Thurstone (1947), scale refinement was considered to strengthen the instrument and arrive at the simplest solution. Therefore, using the cut-off point of .40 for factor loadings and .25 for cross-loadings (Pett, Lackey, & Sullivan, 2003), eight items were additionally removed from the 25-item LEI, which resulted in the K-LEI with 17 items that accounted for 37.9% of the total variance. The refined five-factor solution and their respective items, pattern coefficients, communality estimates, means, and standard deviations are presented in Table 2.

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2) Such random samples can be generated using typical statistical packages such as SPSS. For this study, 50 random data sets with the sample size of 244 were generated for the PA analysis.

Table 2. Items, Pattern Coefficients, Communality Estimates, Means, and Standard Deviations for the 17-item, 5-Factor Korean Version of the Locus of Evaluation Inventory

17 Items (α = .80)	Pattern Coefficients					h^2	M	SD
	F1	F2	F3	F4	F5			
Factor 1: Low Self-Regard (5 items; α = .78)								
When others get upset at me it is hard for me to like myself.	**.83**	-.20	.14	.07	-.07	.57	3.20	1.17
It is hard for me to feel good about myself when I receive	**.77**	.12	-.01	-.10	.09	.60	3.64	1.09
I feel worthless when I know I have disappointed someone.	**.68**	-.11	.07	-.05	.01	.41	3.27	1.24
It is hard for me to accept positive feedback from myself.	**.55**	-.12	.19	.07	-.12	.37	2.49	1.09
I am more likely to accept positive feedback from someone	**.45**	.03	-.43	-.08	.32	.39	4.06	1.13
Factor 2: Concern for Others' Opinions (5 items; α = .66)								
I often think about my appearance.	-.15	**.74**	-.04	-.01	-.08	.40	4.65	.95
I want to tell others about my accomplishments.	-.12	**.52**	-.07	-.20	-.04	.22	4.45	1.00
What other people think of me is important.	-.05	**.50**	.06	.10	.23	.44	4.48	.97
I frequently ask others if I look alright.	.04	**.45**	.28	-.03	-.18	.31	3.18	1.39
I often worry about other people's opinions of me.	.21	**.41**	.12	.18	.09	.55	3.81	1.25
Factor 3: Dependence (3 items; α = .61)								
I often rely on others to tell me what to do.	.06	.12	**.60**	-.10	.04	.42	3.39	1.14
I often stand my ground even when others disagree with me.*	-.70	-.25	**.56**	.04	.21	.36	2.89	.96
My ability to complete a task often depends on whether others believe I can do it.	.26	.01	**.54**	-.18	-.09	.38	2.98	1.19
Factor 4: Public Self-Consciousness (2 items; α = .46)								
When I fail, I don't usually tell others.	.11	.09	-.20	**.57**	-.09	.33	3.45	1.20
When I make a mistake, I openly admit it.*	-.05	-.09	-.04	**.52**	.00	.23	2.68	.90
Factor 5: Show-off (2 items; α = .48)								
I rarely wonder what others think of me.*	-.12	.08	.13	-.10	**.77**	.62	4.44	.88
Regardless of what others say, I can be happy with myself.*	.19	-.16	.19	.15	**.41**	.34	3.87	1.09

Note. N = 244. h^2 = communality estimates; F1 = Low Self-Regard; F2 = Concern for Others' Opinions; F3 = Dependence; F4 = Public Self-Consciousness; and F5 = Show-off. * = negatively scored items.

The EFA results revealed that the four factors found in the United States were retained, but a new factor emerged. Specifically, items for Low Self-Regard (5 items, accounting for 21.1% of the total variance), Concern for Others' Opinion (5 items, accounting for 6.2%), Dependence (3 items, accounting for 4.2%), and Public Self-Consciousness (2 items, accounting for 3%) were almost identical with those found in the United States. However, a newly emerged factor with two items drew attention because it seemed to reflect a specific defense strategy of Korean people, named 'Hoe-Sei,' which taps into individuals' effort to show off the superior self image over their actual image (Lee & Park, 1990). The items for this factor included "Regardless of what others say, I can be happy with myself" and "I rarely wonder what others think of me." The new factor was named Show-off (2 items, accounting for 3.5% of the variance). The intercorrelations among the five factors were all positive ranging from .39 (between factors 1 and 2) to .10 (between factors 2 and 4).

The significant negative correlation between the external K-LEI (total) and self-esteem (r = -.49, p < .01) supported the study hypothesis providing evidence for convergent validity. The negative association indicates that as an individual's internal locus of evaluation increases, self-esteem increases. In addition, all five K-LEI factors shared significant negative correlations with self-esteem ranging from r = -.54 for Factor 1 (i.e., Low Self-Regard) to r = -.19 for Factor 3 (i.e., Public Self-Consciousness), all ps < .001. Note the higher scores on the K-LEI indicate the stronger endorsement in the external LOE. From Bucur and Lee's (2006) results with an American sample, the correlation between external LOE and self-esteem was -.59 (p < .05) and the correlations between the subscales of the LEI and self-esteem ranged from -.33 (Concerns for Others' Opinions) through -.35 (Public Self-Consciousness) to -.64 (Low Self-Regard), all ps < .05. Although the direct comparison between the data from Korea and the U.S. is difficult, the magnitude of correlations between external LOE and self-esteem seems a bit larger in Korea than the U.S.

In addition, the significant positive correlations between the external K-LEI and the measures of anxiety provided estimates for concurrent validity. The positive relationship indicates that as an individual's external locus of evaluation increases, his/her anxiety increases. This result also supports the study hypothesis. In addition, all five K-LEI factors shared significant positive correlations with anxiety ranging from r = .36 for Factor 1 (i.e., Low Self-Regard) to r = .23 for Factor 4 (i.e., Public Self-Consciousness) with the Personal Report of Confidence as a Speaker, r = .43 for Factor 1 (i.e., Low Self-Regard) to r = .19 for Factor 2 (i.e., Concern for Others' Opinion) with the Social Interaction Anxiety Scale, all ps < .001

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Table 3. Correlations among the Variables of Interest and the Five K-LEI Factors

Variable	1	2	3	4
1. Rosenberg Self-Esteem Inventory	—			
2. Personal Report of Confidence as a Speaker	-.41	—		
3. Social Interaction Anxiety Scale	-.48	.42	—	
4. Korean Locus of Evaluation Inventory	-.49	.43	.44	—
Low Self Regard	-.54	.36	.43	.81
Concern for Others' Opinion	-.22	.24	.19	.73
Dependence	-.28	.28	.23	.63
Public Self-Consciousness	-.19	.23	.31	.34
Show-off	-.27	.26	.27	.58

All ps < .001.

(see Table 3). Additionally, the alpha coefficient for the K-LEI total was .80, suggesting a reasonably high internal consistency among items.

Discussion

The study findings provide implications for both researchers and practitioners in counseling. First, the construct of Locus of Evaluation (LOE) measured by the Korean version of the LEI is multidimensional, which is consonant with the findings of Bucur and Lee (2006) with American college students. From a cross-cultural perspective, although a direct comparison between Koreans and Americans in terms of the correlations between external LOE and self-esteem is difficult, the magnitude of the correlations was a bit larger in the Korean sample than the U.S. sample in Bucur and Lee's (2006) study. It would be premature to interpret its cultural implications at this point, yet it can be a promising direction for future research. The multiple dimensions of LOE which have been found in both studies suggest that LOE may be a multifaceted and complicated construct, over and beyond the simple pendulum with internal and external poles.

More importantly, the emergence of a new factor, show-off, from the construct of LOE in Korean culture suggests that the LEI be a culturally-sensitive measure. Kim, Kim, Park, and Lee (1991) explained that 'show-off' reflects a tendency to save face by pretending to be smarter, richer, or more attractive than what they really are, which may stem from people's high sensitivity toward others' evaluation. Show-off can be conceptualized as a

Korean-specific strategy to protect vulnerable self-images (see Crocker & Major, 1989, for examples of self-protecting strategies). Considering high pressure to conform to familial or societal norms in Korean culture, people are vigilant of figuring out what the expectations are and they may use show-off and present superior self-images so that they can preclude others' judgment upon their real selves.

Show-off also has an important implication in counseling because it can assist practitioners to understand the self-presentation of Korean clients. Self-presentation is people's ways of shaping their attitudes and behaviors to create specific self-images that can be used as a fundamental feature of social interaction (Goffman, 1959). It is conceptualized as an automatic and natural process, rather than a deceptive or manipulative attempt (Baumeister, 1982; Hogan & Cheek, 1983). However, when individuals perceive that other people expect them to possess positive and socially-desirable characteristics they may exaggerate their self-presentation, sometimes to the extent of self-glorification (Brown, 1994; Leary & Baumeister, 2000). In this vein, Korean clients who have Hoe-Sei (show-off) may tend to present themselves in an exaggerated way; they might reduce the intensity/severity of their presenting problems, or inflate their reputation and performance. Furthermore, it is possible that they attempt to present themselves in accordance with what the counselors expect, given that a counselor can be perceived as a significant other or an authority figure (Chang, 2002). Thus, when counselors work with Korean clients with high levels of Hoe-Sei, they are advised to examine carefully the validity of the clients' self-reports. The cultural implications of the 'show-off' factor need to be further scrutinized in order to ensure its construct validity; for example, future researchers may want to explore the correlations between the items in this factor and a new scale measuring an individual's tendency to pretend (e.g., I tend to pretend OK in presence of others).

As hypothesized, the correlation results of the K-LEI with measures of self-esteem and anxiety provide support for the Rogers' (1959) proposition that the construct of LOE is a key variable affecting an individual's psychological health. The study findings indicate that as an individual places greater emphasis on internal locus of evaluation, he or she is likely to experience more positive self-regard and less anxiety. Specifically, the positive association between internal LOE and high self-esteem suggests that the construct of LOE in Korea can be an important variable to enhance one's self-esteem. Self-esteem with internal focus of LOE is consistent with what Deci and Ryan (1995) called true (non-contingent) self-esteem, which differs from contingent self-esteem. Given that true self-esteem can be developed through authentic relationships characterized by unconditional positive regard (Ryan, 1993),

counselors working with Korean clients high on the external LOE are advised to pay special attention to forming a trusting relationship to facilitate the shift of their LOE to internal. In addition, attention is warranted on the positive association between external LOE and anxiety in this study. This seems to reflect Korean-specific characteristics, such as 'Cheong' (Choi & Lee, 1999) or 'Chemyon' (Kim & Choi, 2000) since the more one's values and self-regards are decided by others' evaluation (i.e., having external LOE), Korean people may experience elevated levels of anxiety. The culture of 'Cheong' where sometimes too close and intertwined relationships are imposed, may give pressure for people to be sensitive to others' reactions and expectations. Under such pressure, people are likely to get anxious particularly when they are conscious of a forthcoming failure to measure up to others' expectations (Choi & Kim, 1999; Kim, Kim, & Choi, 2000).

Future research agenda may include the following. A desirable way to prove Rogers' (1951) theoretical proposition that counseling based on unconditional positive regard can change clients' LOE is to test empirically how clients' LEI scores change over the course of counseling. In addition, researchers can investigate how counselor variables (e.g., experience level, theoretical orientations, counselors' LEI scores, etc.), working alliance, severity of clients' presenting problems, and personality variables (for both counselors and clients) affect clients' levels of LOE. Such effort would elucidate the interface of counseling factors with clients' LOE and the way to shift the focus of LOE from external to internal through counseling experience. In essence, the K-LEI has promise since it can serve as a measure of both counseling process and counseling outcome.

Limitations should also be noted. A relatively small amount of total variance (37.9%) explained by the 17-item K-LEI needs further exploration of the item content and factor structure of the scale. The 5-factor structure of the K-LEI is tentative without its cross-validation with another Korean college student sample. The factor structure of the K-LEI particularly with 17 items should be subject to a confirmatory factor analysis in future studies. Also, the small number of items in Factors 4 and 5 (2 items each) along with low internal consistency estimates (.46 for Factor 4 and .48 for Factor 5) warrant further validation of the K-LEI. One idea might be adding new items for Factors 4 and 5 to be more reliable. However, caution should be also used with this approach given the advancement in the psychometric field. Issues center on the question, 'Does a high alpha coefficient ensure the validity of the scale?' The tentative answer is negative because (a) alpha coefficient, which concerns item homogeneity, can be inflated by the number of items and repetitions of items(Boyle, 1991), and (b) high internal consistency among items does not

necessarily ensure the validity (i.e., structural validity) of a scale (see discussions by Cohen & Swerdlik, 1999). Along with Cattell (1973), Boyle (1991) even argued that "it is theoretically possible for a scale to be reliable even though the internal consistency is zero ... it is well known that even a highly reliable scale is not necessarily valid." (p.293). Taken together, the low alpha coefficients for Factors 4 and 5 certainly are not desirable and warrants further refinement of items, yet the fact itself does not discount the structural validity of the K-LEI. Lastly, the role of the LOE in mental health can be further illustrated by examining its relationship with other indices of psychological distress (e.g., depression, helplessness, interpersonal conflicts, career indecision, etc.).

Despite such limitations, this study is a meaningful research effort by testing the psychometric properties of the Locus of Evaluation Inventory in Korean culture, and providing useful information about the close relationship between external LOE and elevated anxiety in Korean college students. It is expected that the K-LEI with further validation has potential to be utilized both in counseling research and practice as a core variable of self affecting clients ' psychological adjustment.

References

Alicke, M. D., Klotz, M. L., Breitenbecher, D. L., Yurak, T. J., & Vredenburg, D. S. (1995). Personal contact, individuation, and the better-than-average effect. *Journal of Personality and Social Psychology, 68,* 804-825.

Bakan, D. (1966). *The duality of human existence.* Boston: Beacon Press.

Baumeister, R. F. (1982) A self-presentational view of social phenomena. *Psychological Bulletin, 91,* 3-26.

Baumeister, R. F., & Leary, M. R. (1995). The need to belong: Desire for interpersonal attachments as a fundamental human motivation. *Psychological Bulletin, 117,* 497-529.

Blascovich, J., & Tomaka, J. (1991). Measures of self-esteem. In: J. Robinson, P. Shaver, & L. Wrightsman (Eds.), *Measures of personality and social psychological attitudes* (pp.115-160). San Diego, CA: Academic Press.

Blumer, H. (1969). *Symbolic Interactionism: Perspective and Method.* Englewood Cliffs, NJ: Prentice-Hall.

Boyle, G. J. (1991). Does item homogeneity indicate internal consistency or item redundancy in psychometric scales? *Personality and Individual Differences, 12,* 291-294.

Brown, J. D. (1994, October). *Self-esteem: It's not what you think.* Paper presented at the Society for Experimental Social Psychology, Lake Tahoe, NV.

Bucur, D. R., & Lee, D-G. (2006, August). *Locus of Evaluation Measurement: Implications for Counseling Psychology.* Poster presented for presentation at the annual meeting of the American Psychological Association, New

Orleans.

Butler, A. C., Hokanson, J. E., & Flynn, H. A. (1994). A comparison of self-esteem liability and low trait self-esteem as vulnerability factors for depression. *Journal of Personality and Social Psychology, 66,* 166-177.

Cattell R. B. (1973). *Personality and mood by questionnaire*. San Francisco, CA: Jossey-Bass.

Chang, S. S. (2002). The counselor character desired in Korean culture. *The Korean Journal of Counseling and Psychotherapy, 14,* 547-561.

Cho, Y. L. (2004). The reliability and validity of a Korean version of the speech anxiety thoughts inventory. *The Korean Journal of Clinical Psychology, 23*, 1109-1125.

Choi, S. J., & Kim, K. B. (1999). The self in the Koreans' mind in comparison with the western self-concept. *The Korean Journal of Social and Personality Psychology, 13*, 275-292.

Choi, S. J., & Lee, J. J. (1999). The psychological interior and social-cultural functions of Korean Cheong. *The Korean Journal of Social and Personality Psychology, 13*, 219-234.

Cline, R. J. (1975). *An experimental study of the effects if interviewee locus of evaluation and interviewer style in depth and amount of interviewee self-disclosure and other-disclosure*. Unpublished doctoral dissertation, The Pennsylvania State University, University Park.

Cohen, R. J., & Swerdlik, M. E. (1999). *Psychological testing and assessment* (4th ed.). Mountain View: CA, Mayfield Publishing Company.

Cooley, C. H. (1902). *Human nature and the social order*. New York: Scribner's.

Crocker, J., & Major, B. (1989). Social stigma and self-esteem: the self-protective properties of stigma. *Psychological Review*, *96*, 608-630.

Crocker, J., & Wolfe, C. T. (2001). Contingencies of self-worth. *Psychological Review, 108,* 593-623.

Daly, J. A. (1978). The assessment of social-communicative anxiety via self-reports: A comparison of measures. *Communication Monographs*, *45*, 204-218.

Deci, E. L., & Ryan, R. M. (1995). Human autonomy: The basis for true self-esteem. In M. H. Kernis (Ed.), *Efficacy, agency, and self-esteem* (pp. 31-49). New York: Plenum Press.

Diehl, M., Own, S. K., & Youngblade, L. M. (2004). Agency and communion attributes in adults' spontaneous self-representations. *International Journal of Behavioral Development, 28,* 1-15.

Fleming, J. S., & Courtney, B. E. (1984). The dimensionality of self-esteem. *Journal of Personality and Social Psychology, 46,* 404-421.

Goffman, E. (1959). *The presentation of self in everyday life*. New York: Anchor Books.

Gollwitzer, P. M. (1986). Striving for specific identities: The social reality of self-symbolizing. In R. Baumeister (Ed.), *Public self and private self* (pp.143-159). New York: Springer-Verlag.

Hall, E. T. (1996). *The hidden dimension*. New York: Doubleday.

Ho, D. (1998). Interpersonal relationships and relationship dominance: An analysis based on

methodological relationalism. *Asian Journal of Social Psychology*, *1*(1), 1-16.

Hogan, R. & Cheek, J. M. (1983). Identity, authenticity, and maturity. In T. R. Sarbin & K. E. Scheibe (Eds.), *Studies in Social Identity* (pp. 339-357). New York: Praeger.

Horn, J. L. (1965). A rationale and test for the number of factors in factor analysis. *Psychometrika, 32,* 179-185.

James, W. (1890). *The principles of psychology* (Vol. 1). Cambridge, MA: Harvard University Press.

Kaiser, H. F. (1960). The application of electronic computers to factor analysis. *Educational and Psychological Measurement, 20,* 141-151.

Kenny, D. A., & DePaulo, B. M. (1993). Do people know how others view them?: An empirical and theoretical account. *Psychological Bulletin, 114,* 145-161.

Kernis, M. H., & Goldman, B. M. (2003). Stability and variability in self-concept and self-esteem. In M. R. Leary & J. P. Tangney (Eds.), *Handbook of self and identity* (pp. 106-127). New York, NY: Guilford.

Kruger, J. (1999). Lake Woebegone be gone! The "below-average effect" and the egocentric nature of comparative ability judgments. *Journal of Personality and Social Psychology, 77,* 221-232.

Kim, N. J. (2000). Social self discrepancy in social anxiety. *The Korean Journal of Clinical Psychology, 19*, 473-483.

Kim, K. B., & Choi, S. J. (2000). The Internal Structure of the Korean Social Face (Chemyon). *The Korean Journal of Social and Personality Psychology, 14,* 185-202.

Kim, K. B., Kim, J. Y., & Choi, S. J. (2000). The structural relationship among Cheong, and its actions and functions. *The Korean Journal of Social and Personality Psychology, 14*, 203-222.

Kim, J. E., Kim, J. K., Park, Y. S., & Lee, K. H. (1991). A standardization study of EWHA Defense Mechanism Test (EDMT). *Journal of the Korean Neuropsychiatric Association, 30,* 582-592.

Leary, M. R. (1983) A brief version of the Fear of Negative Evaluation Scale, *Personality and Social Psychology Bulletin, 9*, 371 – 375.

Leary, M. R., & Baumeister, R. F. (2000). The nature and function of self-esteem: Sociometer theory. In M. P. Zanna (Ed.), *Advances in experimental social psychology* (Vol. 32, pp.1-62). San Diego, CA: Academic Press.

Lee, K. H., & Park, Y. S. (1990). Korean's major defense mechanisms presented in traditional proverbs. *Journal of the Korean Neuropsychiatric Association, 39,* 721-732.

Lee, Y. H. (1993). *The relationships among attribution styles, life events, event attributions, hopelessness, and depression: An analysis using covariance structural model*. Unpublished dissertation, Seoul National University, Korea.

MacDonald, G., & Leary, M. R. (2005). Why does social exclusion hurt? The relationship between social and physical pain. *Psychological Bulletin, 131,* 202 – 223.

Markus, H. R., & Kitayama, S. (1991). Culture and self: Implications for cognition, emotion,

and motivation. *Psychological Review, 98*, 224-253.

Mattick, R. P., & Clarke, J. C. (1998). Development and validation of measures of social phobia scrutiny fear and social interaction anxiety. *Behaviour Research and Therapy, 36,* 455–470.

Mead, G. H. (1934). *Mind, self, and society.* Chicago: University of Chicago Press.

Miller, J. O. (1963). *Role perception and reinforcement conditions in discrimination learning among culturally deprived and non-deprived children*. Unpublished doctoral dissertation, George Peabody College for Teachers, Nashville.

Neisser, U. (1993). *The perceived self: Ecological and interpersonal sources of self-knowledge*. Cambridge, UK: Cambridge University Press.

O'Connor, B. P. (2000). SPSS and SAS programs for determining the number of components using parallel analysis and Velicer's MAP test. *Behavior Research Methods, Instrumentation, and Computers*, *32,* 396-402.

Paul, G. L. (1996). *Insight versus desensitization in psychotherapy.* Stanford University Press, Stanford.

Pett, M. A., Lackey, N. R., & Sullivan, J. J. (2003). *Making sense of factor analysis: The use of factor analysis for instrument development in health care research.* Thousand Oaks, CA: Sage.

Raskin, N. J. (1952). An objective study of the locus-of-evaluation factor in psychotherapy. In W. Wolff & J. A. Precker (Eds.), *Success in psychotherapy* (pp.143-162). New York: Grune & Stratton.

Raskin, N. J., & Rogers, C. R. (2000). Person-centered therapy. In R. J. Corsini & D. Wedding (Eds.), *Current psychotherapies* (6[th]ed., pp.133-167). Belmont, CA: Wadsworth.

Rosenberg, M. (1965). *Society and the adolescent self-image.* Princeton, NJ: Princeton University Press.

Rogers, C. R. (1951). *Client-centered therapy*. Boston, MA: Houghton-Mifflin Co.

Rogers, C. R. (1959). A theory of therapy, personality, and interpersonal relationships, as developed in the client-centered framework. In S. Koch (Ed.), *Psychology: A study of a science* (Vol 3, pp.184-256). New York: McGraw-Hill Co., Inc.

Ryan, R. M. (1993). Agency and organization: Intrinsic motivation, autonomy and the self in psychological development. In J. Jacobs (Ed.), *Nebraska symposium on motivation: Developmental perspectives on motivation*, Vol. 40 (pp.1-56). Lincoln: University of Nebraska Press.

Shrauger, J. S., & Schoeneman, T. J. (1979). Symbolic interactionist view of self-concept: Through the glass darkly. *Psychological Bulletin, 86,* 549-573.

Suh, E. M. (2000). Self, the hyphen between culture and subjective well-being. In E. Diener & E. M. Suh (Eds.), *Culture and subjective well-being* (pp.63-86). Cambridge, MA: MIT Press.

Tabachnick, B. G., & Fidell, L. S. (2001). *Using multivariate statistics* (4th ed.). Needham Heights, MA: Allyn and Bacon.

Thurston, L. L. (1947). *Multiple factor analysis*. Chicago: University of Chicago Press.

Velicer, W. F., Eaton, C. A., & Fava, J. L. (2000). Construct explication through factor or component analysis: A review and evaluation of alternative procedures for determining the number of factors or components. In R. D. Goffin & E. Helmes (Eds.), *Problems and solutions in human assessment*. Norwell, MA: Kluwer Academic.

Zwick, W. R., & Velicer, W. F. (1982). Factors influencing four rules for determining the number of components to retain. *Multivariate Behavioral Research, 17,* 253-269.

Zwick, W. R., & Velicer, W. F. (1986). Comparison of five rules for determining the number of components to retain. *Psychological Bulletin, 3,* 432-442.

한국판 자기 평가 소재 척도의 타당화

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본 연구에서는 자기 평가 소재 척도(Locus of Evaluation Inventory: LEI; Bucur & Lee, 2006)를 한국적 맥락에서 타당화하고, 자기 평가 소재가 개인의 정신건강과 어떤 관련이 있는지를 알아보기 위하여 탐색적 요인분석 및 자존감, 불안척도(발표불안, 사회불안)와의 상관분석을 실시하였다. 요인분석 결과, 25문항 중 요인선정 기준(Pett, Lackey & Sullivan, 2003)에 미흡한 8개 문항이 추가로 삭제되어 총 17문항, 5요인 구조가 제안되었다. 4개요인(낮은 자존감, 타인의 의견에 신경 쓰기, 의존성, 공적인 자의식)은 미국에서의 요인과 동일하게 나타났으나, 한국 문화의 특수성을 반영하는 새로운 제 5요인(허세)이 나타났다. 상관분석 결과, 한국판 LEI 총점은 자존감과 유의미한 부적 상관을 보여 수렴타당도를 제공하였고, 발표불안 및 사회불안과는 유의미한 정적 상관을 보여 LEI의 공존타당도를 제공하였다. 이러한 결과는 LOE가 문화의 영향을 받는 변인임을 보여줌과 동시에 한국인의 정신건강을 이해하기 위해 LOE를 적용한 연구가 유용할 수 있음을 시사한다.

주요어 : 자기 평가 소재, 자기 평가 소재 척도, 자존감, 발표불안, 사회불안