

L'ÉCHELLE DE SOLITUDE SOCIALE ET ÉMOTIONNELLE (ÉSSÉ): A FRENCH-CANADIAN ADAPTATION OF THE SOCIAL AND EMOTIONAL LONELINESS SCALE FOR ADULTS

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Although there exist many psychological measures in the English language, few of these clinical and research instruments have been translated into French and subsequently validated. The purpose of this study was to develop and validate L'Échelle de Solitude Sociale et Émotionnelle (l'ÉSSÉ). L'ÉSSÉ is a French translation of the short form of the Social and Emotional Loneliness Scale for Adults (SELSA-S; DiTommaso, Brannen, & Best, 2004; DiTommaso & Spinner, 1993). The SELSA is a multidimensional scale which measures the social and emotional components derived from Weiss' (1973) typology of loneliness. A total of 252 French-speaking individuals, aged between 17 and 79 years, completed the new measure. Reliability and validity assessment indicated that l'ÉSSÉ displays excellent psychometric properties.

Keywords: loneliness, SELSA, ÉSSÉ, French-Canadian.

Loneliness is a subjectively unpleasant and distressing feeling with potentially serious consequences (Peplau & Perlman, 1982). For an age-old and common occurrence (it has been estimated that one out of four people experience loneliness; Cutrona, 1982; Weiss, 1973), research on loneliness is a fairly recent

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phenomenon. Weiss' (1973) book *Loneliness: The Experience of Emotional and Social Isolation*, was a milestone in stimulating interest and research on this topic. According to Weiss, there are two types of loneliness: emotional loneliness, produced by the absence or loss of an intimate attachment figure (e.g., spouse, lover, parent, child); and social loneliness, created by the absence of an engaging social network (e.g., friends, coworkers, peers). Furthermore, he suggested that the experience of loneliness is a natural response to a lack of certain significant relationships.

Despite Oshagan and Allen's view (1992) that "generally, no single conceptualization of what constitutes loneliness is shared by scholars in the area" (p. 382), three major theories have been proposed: first, the *needs for intimacy* approach stipulates that "proximity-promoting mechanisms may have survival value" (Peplau & Perlman, 1982, p. 5). Weiss referred to Bowlby's (1973) work on attachment which proposed the tendency for human beings to make strong affectional bonds. If those needs are not met in childhood, loneliness can later ensue. The second theory, *cognitive processes*, suggests that it is people's evaluation and perception of dissatisfaction with their relationships that make them vulnerable to loneliness (Peplau & Perlman, 1982). Finally, Young's (1982) behavioral-cognitive theory claims that insufficient social interaction which serves as *social reinforcement* is the major deficiency experienced by lonely people. The level of loneliness one experiences is dependent on the history of reinforcement to which one is accustomed.

Regardless of how loneliness is conceptualized, or what its cause may be, it can affect many of us at some point in our lives. For some, it is a constant part of daily life which can last over a period of years, and has been associated with lower reported life satisfaction (e.g., Goodwin, Cook, & Yung, 2001; Gray, Ventis, & Hayslip, 1992; Kim, 1997; Neto, 1995). Loneliness has also been closely associated with alcoholism, suicide, and physical illness (see Ernst & Cacioppo, 1999 for a review). Moreover, whether it be as a precursor or outcome, loneliness has been strongly associated with mood disorders, such as depression, and anxiety (e.g., DiTommaso & Spinner, 1997).

DEPRESSION AND ANXIETY

Although loneliness is related to depression, Weiss (1973) has explained the difference between these two constructs. According to Weiss, the lonely person has a drive to establish new or old relationships in order to free himself/herself of the aversive state, while the depressed person surrenders to the distressed state and often lacks the drive to reinstate old or new relationships. *Depression is a mood disorder characterized by sadness, decreased motivation, negative thoughts and physical symptoms such as fatigue and change in appetite* (American Psychiatric Association, 1994). Consequently, depressed individuals may be more likely to

overstate the negative aspects of their relationships and, as a result, feel lonely (Young, 1982).

Since people suffering from loneliness often describe themselves as tense and restless, anxiety is yet another emotion associated with loneliness (DiTommaso & Spinner, 1997; Peplau & Perlman, 1982). *Anxiety is an experience of apprehension, tension and worry* (American Psychiatric Association, 1994). Young (1982) also suggested: "When there is a gap between desired and actual relationships, individuals can react in many ways. If they believe that they cannot function safely on their own, they may experience anxiety" (p. 381).

Given the distressing nature of loneliness, its link to mental health problems is not surprising. However, there still exist different conceptions of loneliness. Contrary to Weiss' multidimensional typology, the UCLA Loneliness Scale, possibly the most used loneliness instrument, has evolved from a unidimensional view of loneliness. In this sense, Oshagan and Allen (1992) note the discrepancy between these two perspectives; there is disagreement on whether loneliness should be considered a unidimensional or a multidimensional construct (see Marangoni & Ickes, 1989 for a review of this issue).

Recent research has found support for the multidimensional approach. In reexamining Weiss' (1973) distinction between emotional and social loneliness, DiTommaso and Spinner (1993, 1997) further divided emotional loneliness into two subtypes: romantic loneliness and family loneliness. In order to measure these three dimensions of loneliness, the Social and Emotional Loneliness Scale for Adults (SELSA) was developed. Results supported the multidimensional nature of loneliness and the importance of differentiating between these types. They noted that these three forms of loneliness shared some commonality, yet they also reflected different experiences (Russell, Cutrona, Rose, & Yurko, 1984; Vaux, 1988). For example, they noted that the loneliness experienced by a student going away to college was distinct from that experienced by someone faced with the death of a loved one. Thus, an international student who is currently dating and has close friends on campus may not suffer from romantic or social loneliness, but could be vulnerable to family loneliness. However, it is possible that the death of a spouse could trigger all three forms of loneliness if the deceased served all functions (i.e., romantic, family and social).

The use of questionnaires has become an important tool for psychological research. Unfortunately, French-Canadian researchers are at a disadvantage regarding the use of such instruments. In 1989, Vallerand proposed a series of steps involved in the effective translation and validation of questionnaires. The French-Canadian population can now be studied more extensively with the use of these translated questionnaires.

THE PRESENT STUDY

Since loneliness has been correlated with depression and anxiety (e.g., DiTommaso & Spinner, 1997; Peplau & Perlman, 1982; Young, 1982), measures of depression, anxiety, and global loneliness were used in this study in order to develop and validate the French version of the short form of the SELSA (i.e., ÉSSÉ). The French versions of the Beck Depression Inventory (BDI) and the State-Trait Anxiety Inventory (form Y; STAI-Y) were both used to assess the convergent validity of l'ÉSSÉ. L'Échelle de Solitude de l'Université Laval (The UCLA Loneliness Scale), was administered in order to establish the concurrent validity of l'ÉSSÉ.

As the experience of loneliness is widespread and can have serious consequences, it is important that the translation and validation of the SELSA be available to the French-Canadian population. In order to promote social adaptation and mental health in this population, the translation and validation of this scale is important in the discovery of the factors underlying loneliness.

The purpose of the present study was to develop and validate l'Échelle de Solitude Sociale et Émotionnelle (l'ÉSSÉ). It was expected that there would be a substantial relationship between l'ÉSSÉ and the French versions of the UCLA Loneliness Scale, the STAI-Y and the BDI. And it was hypothesized that l'ÉSSÉ would be a reliable measure of loneliness. Finally, all the above evidence would provide further support for the psychometric integrity of the SELSA.

METHOD

PARTICIPANTS

The sample consisted of 252 French-speaking volunteers including 149 university students, 95 nonstudents from New Brunswick, and eight non-students from Québec. The mean age of the sample was 27.9 years, with a range from 17 to 79 and a standard deviation of 12. A total of 183 females and 66 males (three individuals did not report their gender) participated in this study.

The majority of participants (55%) were from l'Université de Moncton. The nonstudent sample was mostly composed of members of the Saint John (New Brunswick) Francophone community. Francophone participants enrolled at the University of New Brunswick - Saint John received course credit for their participation in the study.

MEASURES

The participants first completed a demographics questionnaire which included information regarding age, gender, relationship status, and living arrangements. Then, they answered the following instruments which comprised the rest of the questionnaire package:

L'Échelle de Solitude Sociale et Émotionnelle (l'ÉSSÉ) The French version of the short form of the SELSA (DiTommaso et al., 2004; DiTommaso & Spinner, 1993), is a multidimensional measure of loneliness which assesses social loneliness as well as two aspects of emotional loneliness: romantic and family. It consists of 15 items rated on a Likert-type scale, ranging from 1 (*disagree strongly*) to 7 (*agree strongly*). The SELSA's 3 subscales have high internal reliability, with Cronbach alphas ranging from 0.87 to 0.90, and have been shown to be valid measures of loneliness (DiTommaso et al., 2004).

L'Échelle de Solitude de l'Université Laval (l'ÉSUL) This is the French translation (DeGrace, Joshi, & Pelletier, 1993) of the Revised UCLA Loneliness Scale (Russell, Peplau & Cutrona, 1980), a 20-item global measure of loneliness. l'ÉSUL has been shown to have high internal consistency, with a Cronbach alpha of 0.88, and has also demonstrated high validity (DeGrace et al., 1993). In the present study, l'ÉSUL had high internal reliability ($\alpha = 0.89$).

L'inventaire d'Anxiété Situationnelle et de Trait d'Anxiété (forme Y; IASTA-Y) This is the French version of the State-Trait Anxiety Inventory (Y form) (STAI-Y; Spielberger, 1983). It includes 40 items (the first 20 items measure the level of state anxiety while the last 20 items measure the level of trait anxiety). The IASTA-Y has excellent internal reliability ($\alpha = 0.90$) and has been shown to be a valid measure of both situational and trait anxiety (Gauthier & Bouchard, 1993). The Cronbach alphas in the present study were 0.91 for both the State and Trait anxiety scales.

Questionnaire de Dépression de Beck (QDB; Bourque & Beaudette, 1982) The French version of the Beck Depression Inventory (BDI) (Beck, 1978) consists of 21 items regarding the severity and symptoms of depression. The QDB has been shown to have high internal reliability ($\alpha = 0.92$), as well as being a valid measure of depression (Bourque & Beaudette, 1982). In this study, internal consistency was good ($\alpha = 0.84$).

PROCEDURE

Following Vallerand's (1989) transcultural validation process, a preliminary translation of the SELSA was written and back-translated. The evaluation and preparation of an experimental version was done by a committee (two bilingual psychologists and a professional translator).

In order to evaluate the clarity and comprehensibility of l'ÉSSÉ, a pre-test was administered to 10 French-speaking New Brunswickers who were instructed to indicate any confusing words or sentences. Subjective feedback indicated that all items were clear and comprehensible.

Finally, 21 bilinguals completed both the short form of the SELSA and l'ÉSSÉ in a counterbalanced order to ascertain the effectiveness of the translation. In order to minimize item recall, a two-day interval separated the completion of

each version. A series of paired *t* tests comparing the two forms at the item and subscale levels revealed no significant differences between the two measures. They were highly correlated (Romantic $r = .98$; Family $r = .89$; Social $r = .94$); therefore, l'ÉSSÉ was judged to be an effective translation of the SELSA-S.

The questionnaire package comprising the demographics questionnaire, l'ÉSSÉ, l'ÉSUL, QDB, and IASTA-Y was administered to groups of 20 to 100 people at a time, as well as individually ($N = 4$ francophone nonstudents from the Saint John community). In order to minimize the possible influence of the order of questionnaire presentation, l'ÉSSÉ appeared equally in each ordinal position.

Participants were told that the study involved an examination of their views and opinions on interpersonal relationships and that a debriefing sheet would be given to them upon completion of the questionnaires. Moreover, they were assured that the information provided would remain anonymous and confidential. Next, they were instructed to read and sign the consent form, before completing the package.

The last three steps of Vallerand's transcultural validation method (correlational analysis, construct validity and establishing norms) will be reported in the results section.

RESULTS

Principal Components Analysis (PCA) with varimax rotation was performed on the 15-item ÉSSÉ. Similarly to the results obtained from the English version, the eigenvalues and percentage of variance suggested three distinct factors, which accounted for 65% of the total variance. These results are presented in Table 1.

The first factor was a grouping of items dealing with romantic relationships and was interpreted as reflecting romantic loneliness. The second factor represented social loneliness; while the third dealt with family loneliness. These results indicate that the three subscales of l'ÉSSÉ have good structural stability. The items and loadings for the three factors of l'ÉSSÉ are presented in Table 2.

TABLE 1
EIGENVALUES AND PERCENTAGE OF VARIANCE FOR PRINCIPAL COMPONENTS ANALYSES (PCA)

Component	Eigenvalue	% Variance	Cumulative %
1	4.99	33.3	33.3
2	2.91	19.4	52.7
3	1.81	12.1	64.7
4	1.13	7.5	72.3
5	.80	5.3	77.6
6 Thru 15	3.37	22.4	100.0

Note: $N = 243$

TABLE 2
ITEMS AND VARIMAX ROTATED FACTOR LOADINGS FOR L'ÉSSÉ

Factor	Item No.	1	2	3
Romantic Subscale^a				
	6. J'ai eu un(e) partenaire amoureux(se) ou conjugal(e) qui m'a apporté l'appui et l'encouragement dont j'avais besoin.	.93	.08	-.03
	14. J'ai eu un partenaire amoureux(se) que j'ai aidé à rendre heureux(se)	.91	.12	-.01
	3. J'ai eu une partenaire amoureux(se) avec qui j'ai partagé mes pensées et mes sentiments les plus intimes.	.89	.10	-.10
	15. Mon besoin pour une relation amoureuse intime n'a pas été satisfait.*	.73	.08	.28
	10. J'aurais aimé avoir une relation amoureuse plus satisfaisante.*	.62	.12	.23
Family Subscale				
	11. J'ai senti que je faisais partie de ma famille.	.11	.20	.85
	8. Je me suis senti(e) proche de ma famille.	.09	.16	.84
	12. Ma famille m'a démontré que je comptais pour eux.	-.01	.10	.78
	4. Je n'ai pu compter sur aucun membre de ma famille pour me soutenir et m'encourager, mais j'aurais aimé avoir quelqu'un qui le fasse.*	-.01	.20	.66
	1. Je me suis senti(e) seul(e) au milieu de ma famille.*	.13	.16	.59
Social Subscale				
	9. J'ai pu compter sur mes amis pour de l'aide.	.04	.85	.19
	13. Je n'ai pas eu d'ami qui me comprenait, mais j'aurais souhaité en avoir.*	.11	.79	.15
	5. Mes amis ont compris mes motifs et mon raisonnement.	.11	.77	.14
	3. J'ai eu un(e) partenaire amoureux(se) avec qui j'ai partagé mes pensées et mes sentiments les plus intimes.	.08	.71	.20
	7. Je n'ai pas eu d'ami avec qui partager ma façon de voir, mais j'aurais aimé en avoir.*	.14	.70	.14

^a Items scored on a scale from 1 = *Strongly Disagree* to 7 = *Strongly Agree*

* Reverse scoring on these items.

Norms for the three types of loneliness are presented in Table 3. The highest mean was reported on the Romantic subscale ($M = 3.2$). The other two subscales had identical means of 2.3. There were no significant gender differences on any of the three loneliness subscales. However, there was a significant student versus nonstudent difference on the romantic loneliness subscale, $t(250) = 2.27, p < .05$, such that students experienced more romantic loneliness than did nonstudents.

As is indicated in Table 4, the three subscales have very good internal reliabilities. The Cronbach alphas were .89 for the romantic subscale, .83 for the family subscale, and .84 for the social subscale. This high level of internal consistency is similar to the English version (DiTommaso et al., 2004; .87 for the romantic, .90 for the family and .90 for the social subscales). Although all three subscales were significantly correlated with each other, the correlations were not high enough to limit the individual usefulness of each scale.

TABLE 3
NORMS FOR THE 3 ÉSSÉ SUBSCALES

	Subscale ^a						
	<i>N</i>	Romantic		Family		Social	
		<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>
Males	66	3.3	2.1	2.4	1.4	2.5	1.3
Females	183	3.1	2.0	2.2	1.2	2.3	1.2
Student	149	3.4 ^b	2.1	2.3	1.3	2.3	1.2
Nonstudent	101	2.9 ^b	1.8	2.2	1.2	2.4	1.3
Total	243	3.2	2.0	2.3	1.3	2.3	1.3

^a Potential range for all subscales 1 (*low*) - 5 (*high*).

^b Significantly different from each other, $p < .05$ (independent samples *t* test).

TABLE 4
INTERNAL CONSISTENCIES AND INTERCORRELATIONS OF THE 3 ÉSSÉ SUBSCALES

Subscales	Subscale		
	Romantic	Family	Social
Romantic	.89	.18*	.26**
Family	-	.83	.42**
Social	-	-	.84

Note: $N = 243$

Cronbach α s are presented on the diagonal.

* $p < .01$ ** $p < .001$

In order to measure l'ÉSSÉ's concurrent and convergent validity, a series of correlations were conducted to evaluate the relationship between the three forms of loneliness and measures of depression and anxiety. These correlations are presented in Table 5. As expected, all three subscales of l'ÉSSÉ were significantly correlated with l'ÉSUL. The Social loneliness subscale had the highest correlation ($r = .67$); followed by Family loneliness ($r = .45$) and Romantic ($r = .25$). The IASTA-Y (state anxiety) highly correlated with l'ÉSSÉ's Family loneliness subscale ($r = .39$), with the Social ($r = .32$) and with the Romantic ($r = .29$). As for the IASTA-Y (trait anxiety), there was a high and significant correlation between the Family and Social subscales ($r = .43$) and ($r = .41$), respectively. The Romantic subscale moderately correlated with State-Trait ($r = .23$). The QDB correlated highly with l'ÉSSÉ's Family ($r = .39$) and Social subscales ($r = .38$); while the romantic factor correlated moderately with depression ($r = .16$). As shown in the top half of Table 5, although the three subscales of the ÉSSÉ are related, it is also evident that they are distinct constructs. In particular, the correlations of romantic loneliness with both depression and trait anxiety

were significantly different from the correlations between the social and family subscales and these mental health outcomes. When looking at the ÉSSÉ-ÉSUL correlation, all three subscales were significantly different from each other. There were no significant differences between the subscales on the state anxiety correlation.

Finally, the patterns and magnitudes of the correlations are similar to those reported using the SELSA (see Table 5).

TABLE 5
A COMPARISON OF ZERO-ORDER CORRELATIONS BETWEEN L'ÉSSÉ/SELSA AND MEASURES OF DEPRESSION, ANXIETY AND LONELINESS

Measures	ÉSSÉ ^a		
	Romantic	Family	Social
ESUL ⁺	.25	.45	.67
QDB	.16*	.39	.38
IASTA-Y (STATE)	.29	.39	.32
IASTA-Y (TRAIT)	.23	.43	.41

Measures	SELSA		
	Romantic	Family	Social
UCLA-LS ^c	.40	.37	.79
BDI ^b	.20	.34	.41
SAD ^b	.22	.22	.45
SCL-90-D ^c	.21	.22	.42
SCL-90-A ^c	.12	.10	.20

^a $N = 248-252$; * $p < .01$, all other correlations $p < .001$

^b Fevens, Spinner, & DiTommaso (1994); $N = 177$. BDI: Beck Depression Inventory; SAD: Social Avoidance and Distress Scale; all correlations $p < .01$

^c DiTommaso & Spinner (1997); $N = 241$. UCLA-LS: Loneliness Scale; SCL-90-D and A: Depression and Anxiety subscales; correlations $> .20$ significant at $p < .05$

ÉSSÉ correlations were compared with SELSA-S correlations of the same measure, using + Fisher's r -to- z transformations in the top panel; pairs of correlations with a difference greater than .15 are significantly different from each other, $p < .05$.

DISCUSSION

Evidence from this study supports the psychometric qualities of l'ÉSSÉ as a valid measure of loneliness. Correlational and reliability analyses performed on l'ÉSSÉ were consistent with those obtained from the English version. In addition, these findings indicate that l'ÉSSÉ reproduces the factorial structure of its English counterpart. Consistent with the findings of the SELSA, l'ÉSSÉ's social loneliness scale had the highest correlation with the French version of the UCLA Loneliness Scale (l'ÉSUL). The distinctness of the three factors of l'ÉSSÉ is noteworthy in comparison to l'ÉSUL's unidimensional social loneliness scale.

Even though there are modest intercorrelations among the subscales of l'ÉSSÉ, the three subscales suggest that romantic, family and social loneliness are distinct constructs. While there is still disagreement on the conceptualization of loneliness, this study lends further support to Weiss' (1973) typology of loneliness. Although the UCLA Loneliness Scale has been researched to a greater extent, the findings from this study illustrate the scientific and clinical value of studying loneliness from a broader, multidimensional perspective.

The hypothesis that French versions of the BDI and the STAI-Y would be highly correlated with l'ÉSSÉ was partially confirmed: the Family and Social loneliness subscales were highly correlated with anxiety and depression, while the Romantic loneliness subscale showed a moderate correlation. This may be explained by the large percentage (41%) of participants living with their romantic partner who consider their romantic relationship to be their family relationship as well.

Unlike the results from the SELSA, which have shown that males report significantly more loneliness than females do on the Romantic and Social subscales, no significant sex differences were found in this study. This may have occurred due to the low male representation in the sample (i.e., only 26%). In future research, it would be important to increase the number of male participants in order to better evaluate gender differences in the experience of loneliness. Even though this study showed l'ÉSSÉ to have good psychometric qualities, this instrument would benefit from additional validation research by complementing its use with behavioral observations and clinical interviews with both general (e.g., senior citizens) and psychiatric populations.

The development of l'ÉSSÉ was motivated by the fact that currently no French multidimensional measure of loneliness exists, and by the fact that loneliness is a prevalent and aversive phenomenon that has been associated with many other difficulties in living. Moreover, the development of a new French-Canadian multidimensional measure of loneliness has provided further validation evidence for the SELSA. In conclusion, l'ÉSSÉ is a reliable and valid instrument that could be used in the future to assess emotional and social loneliness in a French-Canadian population.

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