Journal of Depression and Anxiety
ISSN: 2167-1044

Levi-Belz and Elis, J Depress Anxiety 2017, 6:4
DOI: 10.4172/2167-1044.1000288

Review Article Open Access

"I would like to Tell You Something": The Contribution of Self-Disclosure to Social Phobia Symptoms in a Non-Clinical Sample

Yossi Levi-Belz* and Nofar Elis

Department of Behavioral Sciences, Ruppin Academic Center, Israel

Abstract

Social phobia is characterized by intense anxiety from embarrassment and high levels of avoidance of social situations. Several studies have noted the presence of non-normative patterns of self-disclosure among socially anxious individuals. However, little is known regarding the contribution of self-disclosure to symptoms of social phobia in non-clinical populations. The current research aimed to fill this void by exploring the relationship between self-disclosure and social phobia symptoms. Non-clinical participants (N=188) completed questionnaires tapping self-disclosure, depression, as well as social anxiety. Findings showed that limited self-disclosure played a role in facilitating social phobia symptoms, beyond the contribution of depression. Focusing on the ability to share personal information to at least one close person can be seen as a buffer against social phobia symptoms. Implications regarding psychotherapy and population-based intervention are discussed.

Keywords: Social phobia; Self-disclosure; Avoidance; Depression; Anxiety

Introduction

Social phobia (SP) has been found to be the fourth most common mental disorder, with a lifetime prevalence of approximately 12% [1]. It is known as a disorder with chronic development, which increases the risk of comorbidity [2]. SP has been found to be associated with reduced social interaction and impaired social support, as well as with an increased rate of suicide attempts, impaired school performance, impaired medical health, and poor employment performance [3]. Moreover, socially anxious individuals report higher levels of loneliness, depression, and dissatisfaction with their interpersonal and romantic relationships [4]. This lack of contentment can be explained by the tendency to avoid others, a common characteristic of socially anxious individuals, thus contributing to the interpersonal difficulties they tend to experience [5]. Hence, SP symptoms were found associated with high neuroticism, low extraversion, greater self-consciousness, and limited ability to trust others [6].

Notably, these reviewed factors are closely related to a personal characteristic-the ability of *self-disclosure* (SD). In general, SD refers to the process by which persons let themselves be known by others [7]. The act of self-disclosing oneself comprises "any information exchange that refers to the self, including personal states, dispositions, past events, and plans for the future" [8]. The ability to reveal one's true feelings and thoughts to another person is recognized as an important skill that can have a beneficial impact on both physical and mental health [9]. Regarding the other end of the SD continuum, several studies have found strong relationships between limited SD and various mental health characteristics, such as depression, anxiety disorders, and suicidal behavior [10-12].

But what about the contribution of this personal characteristic to the symptoms of social phobia? While some studies have investigated this association, mostly in the context of romantic relationships, the findings have been inconclusive. Socially anxious participants have been found to spend less time engaging in conversation, avoid talking about intimate topics, and failing to match their partner's level of SD, in comparison with controls [13-14]. However, these specific patterns have remained undefined [15,16]. More importantly, these studies did not examine the direct contribution of SD to SP symptoms and did not take into account related or comorbid phenomena.

Investigating of the role of SD in SP symptoms can potentially advance our understanding of the difficulties of socially phobic individuals and enhance treatment protocols in this realm. Thus, the present study focused on SD abilities among participants with SP symptoms of avoidance and anxiety [17]. Given the marked overlap and similarities between social anxiety and depression [18], we aimed to determine whether SD is a contributory factor for SP symptoms, beyond the recognized contribution of depression to these symptoms.

We pose two hypotheses for the present study:

- Negative associations will be found between level of SD and the SP -related symptoms of anxiety and avoidance.
- Individuals' level of SD will contribute to the intensity of SP anxiety and avoidance symptoms, beyond the contribution of depressive symptoms.

Methods

Participants

Participants for the preliminary study were 188 individuals (159 women, 29 men), with age ranging 18 from to 46 (M_{age}=27.79, SD_{age}=3.59). Most participants reported being born in Israel (n=166; 88%) and being native Hebrew speakers (n=173; 92%). Nearly all participants reported being single (n=176; 94%), with 11 (5.5%) married and 1 (0.5%) divorced. Regarding religiosity, 131 (70%) defined themselves as secular, 48 (25.5%) as traditional-religious, 7 (4%) as religious, and 1 (0.5%) as ultra-Orthodox. Regarding education level, 98 (52%) participants attained a high-school education, 28 (15%) attained a post high-school education, and 60 (32%) obtained an

***Corresponding author:** Yossi Levi-Belz, Department of Behavioral Science, Ruppin Academic Center, Emek Hefer, Israel, Tel: +97298983028; E-mail: Yossil@ruppin.ac.il

Received May 18, 2017; **Accepted** May 26, 2017; **Published** May 29, 2017

Citation: Levi-Belz Y, Elis N (2017) "I would like to Tell You Something": The Contribution of Self-Disclosure to Social Phobia Symptoms in a Non-Clinical Sample. J Depress Anxiety 6: 288. doi:10.4172/2167-1044.1000288

academic education. No correlations were found between demographic characteristics and the study variables of SD and SP symptoms.

Most participants were college students who participated in this study as part of the requirements for first-year psychology majors. Other were recruited online, using the 'snowball' method and through social media sites. All participants had given written consent before participated in the study. Inclusion criterion was being without major mental disorder at the time of assessment. Exclusion criteria were being less than age 18 and the inability to speak and write in Hebrew.

Measurements

The Liebowitz Social Anxiety Scale [17] evaluates anxiety and avoidance of 11 social interactions (e.g., going to a party) and 13 performances (e.g., speak in front of people) situations. For the current study, we used two subscale indexes––one for anxiety and one for avoidance-each represented by the sum ratings of all 24 situations on a 4-point Likert-type scale (0=none, 1=mild–tolerable, 2=moderate–distressing, 3=severe–disturbing). The Hebrew version of the self-report LSAS has been validated in previous research [19]. The internal consistency for both the anxiety and avoidance subscales were high (Cronbach alpha of 93 and .91, respectively).

The Distress Disclosure Index [20] measures the tendency to disclose versus conceal personally distressing information, such as personal problems, unpleasant emotions, or upsetting thoughts, across time and situations. The 12-item DDI is presented on a 5-point Likert-type scale, with each response ranging from 1 (*strongly disagree*) to 5 (*strongly agree*). The total DDI score ranges from 12 to 60, with higher scores indicating a greater tendency to disclose distress. Confirmatory factor analysis of the DDI suggested a single construct, with SD on one end and self-concealment on the other [20]. The index has adequate convergent validity and stable test–retest correlations of .80 and .81 across 2-month and 3-month periods, respectively [20]. Internal consistency was also found to be high across studies, ranging from 0.89 to 0.95 [21]. In this study, we found a reliability of 0.86.

The Beck Depression Inventory [22] was used to assess cognitive, affective, behavioral, and somatic symptoms of depression. The BDI comprises 21 items rated on a 4-point Likert-type scale, ranging from 0 (*denial of a symptom*) to 3 (*strong endorsement of a symptom*). Moreover, the BDI discriminates between socially anxious patients with and without a comorbid mood disorder [23]. The Cronbach alpha reliability of this scale for the current study was 0.87.

Participants received a brief description and gave informed consent and then were asked to respond to the questionnaires online *via* Qualtrics.

Data analysis

We initially conducted a series of Pearson correlation tests between the variables. It was followed by a multiple hierarchical regression analyses in order to assess the contribution of SD to anxiety and avoidance, beyond the contribution of depression. The Statistical Package for the Social Sciences (SPSS, version 19.0 for Windows) was used for all analyses.

Results

Table 1 shows the correlations between the different measures in the non-clinical sample. As predicted, we found negative correlations between SD and both avoidance and anxiety levels, as reflected in the LSAS subscales. Additionally, SD was found to be negatively correlated to depression symptoms.

	M	*SD*	Range	LSAS Anxiety	LSAS Avoidance	BDI
Self-disclosure	42.98	7.61	12-60	-0.31**	-0.35**.	-0.28**.
LSAS anxiety	29.36	13.06	0-72		0.78**	0.52**
LSAS avoidance	30.50	11.73	0-72			0.48**
BDI	6.85	6.94	0-63			

Note. **p*<0.05; ***p*<0.01. BDI: Beck Depression Inventory. LSAS: Liebowitz Social Anxiety Scale

Table 1: Correlations for Clinical Measures and Demographic Characteristics for the Non-Clinical Sample (N=188).

Model step	Predictor variables	β	*t*	R^2	$\triangle R^2$	Significance
LSAS Anxiety subscale						
1	BDI	0.58	9.69	0.34	0.34	0.000**
2				0.37	0.03	0.004*
	BDI	0.53	8.64			
	Self-disclosure	-0.18	-2.96			
LSAS Avoidance subscale						
1	BDI	0.54	8.69	0.29	0.29	0.000**
2				0.33	0.04	0.001*
	BDI	0.48	7.62			
	Self-disclosure	-0.21	-3.39			

Note. **p*<0.01; ***p*<0.01. BDI: Beck Depression Inventory. LSAS: Liebowitz Social Anxiety Scale

Table 2: Multiple Hierarchical Regression Analyses for SP Anxiety and Avoidance Subscales (N=188).

In order to assess the contribution of SD to SP symptoms, beyond the contribution of depression, we conducted two multiple hierarchical regression analyses, one for anxiety levels and one for avoidance levels, each as a dependent variable. As can be seen in Table 2, both of the models were significant, accounting for 36.6% of the SP anxiety subscale variance, and 33.4% of the SP avoidance subscale variance. Most of the variance was explained by the depression symptoms, but in both analyses, SD levels added 3% and 4.2% to the variance of anxiety and avoidance subscales, respectively, beyond the contribution of depressive symptoms, F (1,185)=8.75, p=0.004 ; F (1,182)=11.49, p=0.001.

Discussion

In the current study, we aimed to understand the contribution of SD to SP symptoms in a non-clinical sample. As hypothesized, we found that SD is strongly and negatively associated with both anxiety and avoidance symptoms of social phobia. Importantly, we found that in both cases, SD contributed to the level of symptoms beyond the contribution of depression. While other studies have suggested that lack of social skills may be catalyst for higher levels of SP symptoms [24], the current study is the first to examine this relationship directly. Thus, our results expand the existing literature by providing empirical evidence of the role of SD in SP and highlighting the importance of sharing personal information with significant others as a resilience factor for social phobia.

What accounts for SD comprising such a positive effect on SP symptoms? Based on the present findings, two possible explanations can be offered. One explanation can be derived from the interpersonal theory of Harry Stack Sullivan [25], which asserts that healthy human development stems from the ability to establish intimacy with another person. SD enables the forming of social relationships, allowing one to receive the help and support he may need [26].

Numerous studies have shown that authentic SD to at least one significant other person is a necessary prerequisite for healthy adjustment [27-28], as a buffer against stress and mental pain [29-30], and even as a facilitator for growth [31-32]. When individuals share intimate information, this may be an indication of their having formed social relationships, thus enabling them to receive help and support as needed [33]. Perceiving social support and having sense of belongingness are recognized as resilience factors in most psychological-related pathologies [34]. Thus, it may be understood that SD is associated with a decreased level of anxiety and avoidance (as well as a generally lower likelihood of suffering from mental illness) because it serves as an indicator of whether the *need to belong*–a fundamental human psychological need–is met [35]. If this need is unmet, the likelihood of sensing anxiety and avoidance from social interaction will be significantly higher. In other words, as is the case with other mental disorders, SD seems to aid the individual in combating loneliness and detachment and in having a sense of belonging and basic confidence.

A second explanation focuses on the possibility that disclosure of emotional and personal information can help participants craft an alternative narrative about their life and experiences [36]. In other words, the exchange of information with others may help self-disclosing individuals acquire new perspectives on their behavior, attitudes, emotions, and even fears. As [37] emphasized, "SD helps people to gain meaning about their experiences, reframe these experiences as non-threatening, and assimilate them into the self…". Thus, engaging in SD behavior may help individuals gain meaning concerning their behavior, as well as consider alternative perspectives of the social interactions that elicit feelings of anxiety which they seek to avoid. Considering these new perspectives may affect individuals' perception, lessen their anxiety and diminish avoidance behaviors in social interactions. Together, these two possible explanations highlight SD's resilience role in reducing levels of SP symptoms.

Several limitations concerning methodological issues of this study warrant mention. First, the use of self-report measures, though very common in trauma studies, entails the risk of reporting bias (e.g., social desirability), especially relevant when addressing sensitive issues, such as social interaction and social fears. Specifically, previous findings have suggested that reported SD only partially reflects the complex nature of this trait, having minimal overlap with an observed evaluation [37]. Future studies should consider using objective measures, such as structured clinical interviews or linguistic and acoustic measures of SD.

Second, other possible common factors (e.g., DSM-5 diagnoses of other anxiety symptoms) were not measured in the current study and may be responsible for the results. In addition, given the cross-sectional nature of this study and its causal uncertainties, it is not clear whether disclosure difficulties may produce SP symptoms, whether SP symptoms leads to disclosure difficulties, or whether a common third variable may affect both. Third, this study focused on a non-clinical population, and the levels of SP were as expected: Low to medium, with some high-scoring outliers. Thus, this limited our understanding of the role of SD to this population. Future studies should examine SD within a SP DSM-5 diagnosis framework and investigate the predictive values of SD at different phases of psychotherapy.

Despite the noted limitations, the study's perspective on the SD–SP relationship has nevertheless several important implications, mainly with regard to psychotherapeutic interventions. Facilitating SD was found to be a buffer against SP symptoms. Thus, one implication would be to address SD abilities within psychotherapies that deal with avoidance or anxiety symptoms. Specifically, our findings imply that psychotherapies seeking to improve interpersonal connectedness and disclosure, such as interpersonal therapy (IPT), may be useful for individuals suffering from SP symptoms. Further studies should also examine the specific role of SD within psychotherapies that focus on social phobia, such as cognitive behavioral group therapy [38]. Given the prevalence of SP symptoms in the general population [1], an additional implication may be to encourage SD behavior in general, acknowledging its role as a resilience factor for various psychological difficulties, such as SP anxiety and avoidance. Overcoming difficulties in communication may allow individuals not only to speak about themselves and to gain new perspectives, but also to actually change their view of distressing social situations and of the social world in general.

References

1. Kessler RC, Berglund P, Demler O, Jin R, Merikangas KR, et al. (2005) Lifetime prevalence and age-of-onset distributions of DSM-IV disorders in the National Comorbidity Survey Replication. Arch Gen Psychiat 62: 593-602.
2. Kessler RC, Petukhova M, Sampson NA, Zaslavsky AM, Wittchen HU (2012) Twelve-month and lifetime prevalence and lifetime morbid risk of anxiety and mood disorders in the United States. Int J Method Psych 21: 169-184.
3. Erath SA, Flanagan KS, Bierman KL (2007) Social anxiety and peer relations in early adolescence: Behavioral and cognitive factors. J Abnorm Child Psychol 35: 405-416.
4. Sparrevohn RM, Rapee RM (2009) Self-disclosure, emotional expression and intimacy within romantic relationships of people with social phobia. Behav Res Ther 47: 1074-1078.
5. Papsdorf M, Alden L (1998) Mediators of social rejection in social anxiety: Similarity, self-disclosure, and overt signs of anxiety. J Res Pers 32: 351-369.
6. Bienvenu OJ, Samuels JF, Costa PT, Reti IM, Eaton WW, et al. (2004) Anxiety and depressive disorders and the five-factor model of personality: A higher- and lower-order personality trait investigation in a community sample. Depress Anxiety 20: 92-97.
7. Jourard SM (1964) The transparent self: Self-disclosure and well-being. New York: Van Nostrand Reinhold.
8. Derlega VJ, Grzelak J (1979) Appropriateness of self-disclosure. Self-disclosure: Origins, patterns, and implications of openness in interpersonal relationships. 151-176.
9. Lepore SJ, Smyth J (2002) The writing cure. Washington, DC: American Psychological Association.
10. Kahn JH, Garrison AM (2009) Emotional self-disclosure and emotional avoidance: Relations with symptoms of depression and anxiety. J Couns Psychol 56: 573-584.
11. Levi Y, Horesh N, Fischel T, Treves I, Apter A (2008) Mental pain and its communication in medically serious suicide attempts: An "impossible situation". J Affect Disord 111: 244-250.
12. Levi-Belz Y, Gvion Y, Horesh N, Fischel T, Treves I, et al. (2014). Mental pain, communication difficulties, and medically serious suicide attempts: a case-control study. Arch Suicide Res 18: 74-87.
13. Bruch MA, Gorsky JM, Collins TM, Berger PA (1989) Shyness and sociability reexamined: A multicomponent analysis. J Pers Soc Psychol 57: 904-915.
14. Sparrevohn RM, Rapee RM (2009) Self-disclosure, emotional expression and intimacy within romantic relationships of people with social phobia. Behav Res Ther 47: 1074-1078.
15. DePaulo BM, Epstein JA, LeMay CS (1990) Responses of the socially anxious to the prospect of interpersonal evaluation. J Pers 58: 623-640.
16. Jacobson NS, Anderson EA (1982) Interpersonal skill and depression in college students: An analysis of the timing of self-disclosures. Behav Ther 13: 271-282.
17. Liebowitz MR (1987) Social phobia. Mod Probl Pharm 22: 141-173.
18. Watson D (2005) Re thinking the mood and anxiety disorders: a quantitative hierarchical model for DSM-V. J Abnorm Psychol 114: 522-536.
19. Levin JB, Marom S, Gur S, Wechter D, Hermesh H (2002) Psychometric

properties and three proposed subscales of a self-report version of the Liebowitz Social Anxiety Scale translated into Hebrew. Depress Anxiety 16: 143-151.

20. Kahn JH, Hessling RM (2001) Measuring the tendency to conceal versus disclose psychological distress. J Soc Clin Psychol 20: 41-65.
21. Kahn JH, Hucke BE, Bradley AM, Glinski AJ, Malak BL (2012) The Distress Disclosure Index: A research review and multitrait–multimethod examination. J Couns Psychol 59: 134-149.
22. Beck AT, Rush AJ, Shaw BF, Emery G (1979) Cognitive therapy of depression. New York: Guilford Press.
23. Coles ME, Gibb BE, Heimberg RG (2001) Psychometric evaluation of the Beck Depression Inventory in adults with social anxiety disorder. Depress Anxiety 14: 145-148.
24. Levitan MN, Nardi AE (2009) Social skill deficits in socially anxious subjects. World J Biol Psychiatry 10: 702-709.
25. Sullivan HS. (1953) The Interpersonal Theory of Psychiatry. New York: Norton.
26. Jourard SM (1964) The transparent self: Self-disclosure and well-being. New York: Van Nostrand Reinhold.
27. Greenberg M, Stone A (1992) Writing about disclosed versus undisclosed traumas: Immediate and long-term effects on mood and health. J Pers Soc Psychol 63: 75-84.
28. Pennebaker JW (1997) Writing about emotional experiences as a therapeutic process. Psychol Sci 8 162-166.
29. Levi Y, Horesh N, Fischel T, Treves I, Apter A (2008) Mental pain and its communication in medically serious suicide attempts: An "impossible situation". J Affect Disord 111: 244-250.
30. Levi-Belz Y, Gvion Y, Horesh N, Fischel T, Treves I, et al. (2014). Mental pain, communication difficulties, and medically serious suicide attempts: a case-control study. Arch Suicide Res 18: 74-87.
31. Levi-Belz Y (2015) Stress-related growth among suicide survivors: the role of interpersonal and cognitive factors. Arch Suicide Res 19: 305-320.
32. Levi-Belz Y (2016) To share or not to share: The contribution of self-disclosure to stress related growth among suicide survivors. Death Stud 40: 405-413.
33. Cohen S, Sherrod DR, Clark MS (1986) Social skills and the stress-protective role of social support. J Pers Soc Psychol 50: 963-973.
34. Turner RJ, Brown RL (2010) Social support and mental health. A handbook for the study of mental health: Social contexts theories, and systems 200-212.
35. Van Orden KA, Witte TK, Cukrowicz KC, Braithwaite SR, Selby EA, et al. (2010) The interpersonal theory of suicide. Psychol Rev 117: 575-600.
36. Pennebaker JW, Chung CK (2007) Expressive writing, emotional upheavals, and health. Handbook of health psychology 263-284.
37. Levi-Belz Y, Kreiner H (2016) What you say and how you say it: analysis of speech content and speech fluency as predictors of judged self-disclosure. Soc Psychol Personal Sci 7: 232-239.
38. Heimberg RG, Becker RE (2002) Cognitive-behavioral group therapy for social phobia: Basic mechanisms and clinical strategies. Guilford Press.