



**THE RELATIONSHIP BETWEEN SUICIDE ATTEMPT AND
SELF-CARE AGENCY**

Behice ERCİ, PhD¹ Ayşe OKANLI, MsC²

ABSTRACT

Objective: This research was intended to determine the relationship between suicide attempt and self-care agency in individuals who did not present with any mental problem, depression or psychiatric diagnosis, using a case comparison group. What is the relationship between suicide attempt and self-care agency in a specified population?

Method: The framework of the research consisted of 33 hospitalised people, and 33 people accompanying them. The sample group consists of 31 cases and a control of 31 group people with a healthy body and without a significant psychiatric diagnosis, who agreed to join the research.

Result: The results suggested that there was a relationship between the self-care agency and the tendency to commit suicide.

Conclusion: This result can be used to in the public health and psychiatry nursing practices. Necessary improvement of self-care agency is recommended for those who have a history of suicide attempt. Also, more researches must be undertaken related this topic.

Key Words: Demographic characteristics, Self-care agency, Suicide attempt

This research was presented in the First International and 8th National Nursing Congress, October 29-
November 2 / 2000, Antalya, Turkey.

Behice Erci is Assistant Professor in Public Health Nursing Department, School of Nursing, Atatürk
University, Erzurum, Turkey.

Ayşe Okanlı is Research Assistant in Psychiatry Nursing Department, School of Nursing, Atatürk
University, Erzurum, Turkey.

Corresponding Address: Behice Erci Atatürk Üniversitesi, Hemşirelik Yüksekokulu, Erzurum, Türkiye.
Fax: +90- 442-2349264 E-mail: behiceerci@mynet.com behiceerci@hotmail.com

INTRODUCTION

The aim of this research was to determine the relationship between suicide attempts and self-care agency in the individual not having any mental health problems, depression or psychiatric diagnosis.

Suicide attempt was defined as a situation in which a person has displayed an actual or seemingly life-threatening behaviour with the intent of jeopardizing his life or to give the appearance of such an intent, but which has not resulted in death. For the most part it occurs as a result of a tendency or contemplation. The statistics conducted in 1997 show that the rate of suicide among 15 to 35 age groups was 03.18%, and younger women tended to commit suicide compared to men [1]. It is a commonly accepted fact that the attempts which lead to suicide are mostly due to a combination of a number of features such as a person's own self- image, self-respect and self-efficacy, self-care, as well as social, biological and psychological reasons, illness, a past history of suicidal behaviour, personality style and physical disorders and functional impairment [2,3,4]. Self-care is one of most prominent activities that individuals initiate and perform on their own behalf in maintaining life, health, and well being. Also, self-care is a behaviour acquired through interaction, which goes through many stages of development in time. One research has discussed the need to define "outcomes" in health care more holistically, particularly from women's health, chronic illness, and self-care perspectives. The effectiveness of behavioural and cognitive self-care strategies correlated differentially with dimensions of health [5]. Self-care agency is the ability for engaging in self-care [6] that is found at different levels in each person. When a person is unable to maintain his self-efficacy this automatically means that self-care agency is inadequate and ultimately the expected self-care behaviour will not be promoted [7-10].

The investigations regarding self-care agency indicate that these individuals who have high self-care agency have also higher self-esteem and look after themselves much better than those with low self-care agency [10-14]. Nurses should recognize the problems occurring due to inability and the failure in self-care of the individual. The nurse is responsible for the improvement and protection of individual health by guiding and supporting partly or wholly these activities through planning the required activities and by relying on nursing systems [15,16]. So far, the relationship between suicide and depression, hopelessness, pain and chronic illness has been researched, yet the correlation between suicidal behaviour and self-care has been not established despite the fact that this is an important field of investigation to be addressed. However, it is possible that there is correlation between suicide attempt and self-care. Therefore, we conducted this study to determine whether there was a correlation or not.

METHODS

The design of this study utilized a case-control group. The framework of the research consisted of 33 hospitalised people, who attempted suicide between August 1998 and November 1999, and 33 people accompanying them. Two people subsequently declined to join the study. Thus, the study included 31 cases with the control group. Case group had a good physical and mental health and were capable of answering the questions. Since suicide has an important and ethical position, persons who did not want to join the study were not pressurized to join. Those who wanted to join the research were told the aim of the research and its social significance. Having declared their full consent, the patients were supplied with data collected by researchers. Controls were chosen from those who accompanied the patients to hospital. They were usually relatives and friends of the

Behice ERÇİ, Ayşe OKANLI: *The relationship between suicide attempt and self-care agency*

patient, and the controls were taken to determine whether there was a realistic relationship between suicide attempts and self-care agency. Their health record determined that they had no mental health problems. The controls' relationship to the cases did not make any difference to their responses. Because, they answered questionnaire in separate rooms. Two days after the cases were admitted for treatment, the data were collected in the hospital via face-to-face questionnaire with the subjects using a self-care agency scale and survey form by the researcher for case and control groups.

The 43-item scale developed by Kearney and Fleischer in 1979 [17], and was adapted to Turkish Society, whose validity and reliability had been tested by Nahcivan in 1993 [18], and consisted of 35 items. The scale was five point likert in type which had a 35-140 score interval. The independent variables of study were demographic features and suicide attempt and dependent variable was self-care agency.

In the statistical evaluation of data, t-test was used to determine difference between the scores of the case and control groups. Mann Whitney U test was used to determine the association between self-care agency and sex, marital status and previous record of suicide attempt. Correlation was used to investigate the role of age, family size and the number of persons in charge of care. Kruskal-Wallis variance analysis was used to evaluate the impact of other demographic features.

RESULTS AND DISCUSSION

According to the results, the demographic characteristics of the sample group are shown in Table 1.

Table 1. Demographic characteristics of the sample

Demographic characteristics	Case Group		Control Group	
Age	20.74±4.30		27.25±11.50	
Sex	N	%*	N	%*
Male	13	41.9	14	45.2
Female	18	58.1	17	54.8
Marital Status	N	%	N	%
Married	3	9.7	13	48.4
Unmarried	28	90.3	16	51.6
Education	N	%	N	%
Primary school	9	29.0	9	29.0
Secondary school	5	16.1	1	3.2
High school	10	32.3	16	51.6
Higher education	7	22.6	5	16.1
Employment	N	%	N	%
Unemployed	16	51.6	11	35.5
Student	11	35.5	17	54.8
Others	4	12.9	3	9.7
Residence	N	%	N	%
City	26	83.9	29	90.3
District	4	12.9	2	9.7
Rural area	1	3.2	-	-

Behice ERÇİ, Ayşe OKANLI: *The relationship between suicide attempt and self-care agency*

	N	%	N	%
The person in charge of care				
No	24	77.4	17	54.8
Yes	7	22.6	14	45.2
The source of income of the family				
Retired	26	83.8	9	29.0
Civil Servant	3	9.7	13	41.9
Others	2	6.5	9	29.0
Substance using				
Smokers	11	35.5	8	25.8
Alcohol Users	3	9.7	2	6.5
Not users (Not smoker or alcohol user)	17	54.8	21	67.7

*Column percentage was used.

It was found out that the case group had younger mean age (20.74 ± 4.30) than the control group; 90.3% of them were unmarried, the majority of the case group were high school graduates, 51.6% were unemployed, 22.6% had the responsibility for the care of others. 83.8% had source of income from retirement, and 35.5% were smokers (Table 1). Some investigations determined that of the case group young, female and unmarried were more inclined to attempt suicide than others and unemployment and socio-economic status also affected the rate of suicide attempt [19-22]. It was determined that smoking and unsociable personality were among the causes of suicide attempt [23]. Miller et al [24] found that the risk of suicide attempt increased significantly in parallel with the number of cigarette consumption daily (p for trend < 0.001). Multivariable-adjusted analyses demonstrated that smokers of more than 20 cigarettes a day were more than twice as likely to attempt suicide compared to non-smokers. We determined that 32.3 % of the mothers of the case group had no basic education, 48.4% had a primary school education, 16.1% were high school, and 3.2 % were higher school graduates. 9.7% of the fathers of the case group were illiterate, 38.7% were primary school, 22.6 % were high school, 16.1% were secondary school, 12.9% higher school graduates. 90.3% were housewives 48.4% were civil servants, 29.0% were artisans, and 22.6% were pensioners. The number of family member of the case group was mean 5.61 ± 2.10 . The number of family members of controls was mean 6.45 ± 2.22 . Blum et al [25] stated that controlling for gender, income, and family structure together explained no more than 10% of the variance in each of the 5 risk behaviours among younger adolescents and no more than 7% among older youths. These findings are similar to those of our research. But instead of statistical evaluation, only the mean score obtained from self-care agency scale is shown in Table 2.

Table 2. The mean score of scale of case and control groups

Sample group	The mean score of the self-care agency scale		
	Total X±SD	Item X±SD	N
Case group	68.00±18.76	1.94 ±0.5	31
Control group	90.54±19.02	2.58 ±0.5	31
All sample group	79.00±2.78	2.25 ±0.6	62

Behice ERÇİ, Ayşe OKANLI: *The relationship between suicide attempt and self-care agency*

As shown in Table 2, the self-care agency score of the case group was determined lower than the score of the control group. Some other studies found that the score of self-care agency were 79.27 ± 14.05 and 93.54 ± 17.40 [14-18]. The results obtained in this research are very similar to the mean score of the control group and all samples. But the mean score of the case group is lower than the mean score of other researches. This result indicates that the self-care agency of those who experienced suicide attempt is inadequate. The review of the literature basis for discussion of the finding and correlation proposed could not be found, despite the extensive search in libraries and Internet sites. We discussed finding indirect literatures. Also, 35.5% of the cases experienced suicide attempt previously. Ho et al [22] found that persons who had history of prior suicide attempt tried again. Beautrais [26] determined that a minority had a documented history of prior suicide attempts (13.1%). Those who had no history of prior suicide attempt had 17.76 ± 3.50 as the mean score of self-care agency, and those who had a history of prior suicide attempt had a mean score of 12.30 ± 2.71 . But, there was no statistical significance between the groups. The score of people who was history of prior suicide attempt was lower than that of others. Self-care agency is affected by numerous external and internal factors such as level of health, socio-cultural conditions, life style and adequacy or inadequacy of basic necessities of the person [8]. Consequently, individuals tend toward unusual or panicky behaviours [27]. For that reason, that the self-care agency scores of the case group was found lower than the score of the control group. The result showed self-care agency affected suicidal behaviour, and inadequate self-care agency was likely to lead suicide attempt.

Variations between self-care agency and sex, education, the professions of both parents, the education of father, the number of family members, the source of income of the family, smoking and the number of dependent persons were not found statistically significant. In their study Sayan & Erci [14] demonstrated that the profession, economic status, the number of dependent persons and the number of the persons in the family did not affect self-care agency. Similarly, some researchers found that the majority of the demographic characteristics did not affect suicide attempt [14,18,28].

We determined that there was statistical significance between self-care agency and age ($r=.300^*$), marital status (MWU= 224.00, $p=.008$) and the educational status of the mother (KW=9.950, $df=4$, $p=.041$). Other studies have also shown that there was statistical significance between self-care agency, age and marital status [11,12,27,29]. Altun et al. [29] determined that the score of the sample group was dependent on the level of education of mothers, and there was statistical significance between groups. These findings were similar to those of our research.

Table 3. Statistical evaluation of the score obtained from the self-care agency scale

Sample group	The score mean of self-care agency	
	X±SD	N
Case group	68.00±18.76	31
Control group	90.54±19.02	31
$t= 4.698, df= 60, p=.000$		

Behice ERÇİ, Ayşe OKANLI: *The relationship between suicide attempt and self-care agency*

As shown in Table 3, the case group had a mean score of 1.94 for each item. The comparison group had a mean score of 2.57 for each item. The whole sample had a mean score of 2.25 for each item. The scores showed that self-care agency of the case group were lower than that of the control group.

Previous studies have demonstrated that there is a positive relationship between self-agency and self-care agency, that a person who has more self-esteem and self-image had a mean score of 4.1 for each item in self-care agency [11,14].

The mean scores indicate that self-care agency of the case group (68.00 ± 18.76) is lower than that of the control group. Statistically there is a significant difference between the two groups.

The result maintains that there may be the correlation between self-care agency and suicide attempt.

Another research has found that a person who has little self-esteem and self-image is more likely to attempt suicide [30]. Fahs et al. [31] have recommended that self-care is needed to determine risky behaviours of adolescent who attempted suicide. On account of all these results, we may conclude that a person who attempts to commit suicide had a low mean score of self-care agency.

CONCLUSION

According to the results obtained from this investigation the whole sample had 79.00 ± 2.78 , case groups had a self-care agency score of 68.00 ± 18.76 and comparison groups had a self-care agency score of 90.54 ± 19.02 and difference between groups was statistical significant ($t = 4.698$, $df = 60$, $P = .000$). It may be said that there is a relationship between the self-care agency and a willingness to attempt suicide. The results suggest that inadequate self-care agency may be one of the risk factors to attempt suicide. This analysis also show professional support should be provided to those people inclined to attempt suicide and their family members as well. Particularly, when they need to develop their self-care and life-style, nurses must support to the people. Only in this way will it be possible to increase the self-care agency of these people, and to prevent further suicide attempts. Also, more researches must be undertaken related this topic.

REFERENCES

- 1-T.C.Başbakanlık Devlet İstatistik Enstitüsü. İntihar İstatistikleri 1997. Devlet İstatistik Enstitüsü Matbaası, Ankara. 1999.
- 2-Turgay A. Çocuk ve gençlerde intihar girişimleri, Türk Psikiyatri Dergisi 1992; 3: 183-189.
- 3-Çuhadaroğlu F. & Sonuvar B. Adölesan intiharı ve kendilik imgesi. Türk Psikiyatri Dergisi 1993; 4: 29-38
- 4-Conwell, Y. Management of suicidal behavior in the elderly. Psychiatric Clinics 1997; 20: 667-683.
- 5-Webster DC & Brennan T. Self-care effectiveness and health outcomes in women with interstitial cystitis: implications for mental health clinicians. Issues Mental Health Nursing 1998; 19: 495-519.
- 6-Foster P.C. & Janssens N.P. Dorothea E. Orem. Nursing Theories: The Base For Professional Nursing Practice (eds.Alexander R. & Lovering M.L.). 3 rd, Chapter 7, Appleton & Lange. East Norwalk. 1990: pp. 91-112.
- 7-Mele A.L. Theoretical Nursing: Development and Progress, 2 nd, Lippincott, Philadelphia. 1991: 83- 97.
- 8-Orem D.E. Concepts of Practice, 4 th. Edition, Mosby Yearbook, St. Louise. 1991: 95-110.
- 9-Senten MCM. The well-being of patients having coronary artery bypass surgery: a test of Orem's self-care nursing theory. Doctorate Thesis. Maastricht. 1991.
- 10-Simmons SJ. The health promotion self-care system model directions for nursing research and practice, Journal Advanced Nursing 1990; 15: 1162-1166.
- 11-Hartweg DL. Self-care actions of healthy middle aged women to promote well-being, Nursing Research 1993; 42: 221-27
- 12-Schott-Bear D. Dependent care, caregiver burden and self-care agency of spouse caregiver, Cancer Nursing 1993;16: 230-236.
- 13-Whetstone WR. Perceptions of self-care in Sweden a cross-cultural replication. Journal Advanced Nursing 1989;14: 962-969.
- 14-Sayan A, Erci B. Çalışan Kadınların sağlığı geliştirici tutum ve davranışları ile öz-bakım gücü arasındaki ilişkinin değerlendirilmesi. Atatürk Üniversitesi Hemşirelik Yüksekokulu Dergisi 2001; 4: 1-13.
- 15-Babadağ K. & Kenan N. Öz-bakım kavramının cerrahi hemşireliğine uyarlanması, Şişli Etfal Hastanesi Hemşirelik Dergisi 1996; 1: 83-90.
- 16-Velioğlu P. Hemşirelikte Kavram ve Kuramlar, Alaç ofset, İstanbul. 1999: 110-122.
- 17-Kearney BY. & Fleischer BJ. Development of an instrument to measure exercise of self-care agency. Research Nursing in Health 1979; 22: 25-34.
- 18-Nahcivan N.Ö. Sağlıklı gençlerde öz-bakım gücü ve aile ortamının etkisi, İ.Ü.Sağl.Bilm.Enst. Yayınlanmış Doktora Tezi, İstanbul. 1993.

Behice ERÇİ, Ayşe OKANLI: *The relationship between suicide attempt and self-care agency*

- 19-Chastang F., Rioux P., Dupont I., Kovess V. & Zarifian E. Risk Factor associated with suicide commitment in young French People, *Acta Psychiatry* 1998; 98: 474-479.
- 20-Claussen B. Suicidal ideation among the long-term unemployed: a 5 year follow-up. *Acta Psychiatr Scandinavia* 1998 ;98 : 480-486.
- 21-Hintikka J. (1998). Dept and suicidal behaviour in the finnish general population, *Acta psychiatr Scandinavia* 1998; 98: 493-496.
- 22-Ho TP., Yip P.S., Chiu C.W. & Halliday P. Suicide notes what do they tell us? *Acta Psychiatr Scandinavia* 1998; 98: 467-473.
- 23-Angsts J. & Clayton PJ. Personality, smoking and suicide: a prospective study, *Journal of Affective Disorders* 1998; 51: 55-62.
- 24-Miller M., Hemenway D., Bell NS., Yore MM. & Amoroso PJ. Cigarette smoking and suicide: a prospective study of 300,000 male, active-duty Army soldiers. *American Journal Epidemiol* 2000;151: 1060-1063.
- 25-Blum R.W., Beuhring T., Shew M.L., Bearinger L.H., Sieving R.E. Resnick M.D. He effects of race/ ethnicity, income, and family structure on adolescent risk behavior, *American Journal of Public Health* 2000; 90:1879-1884.
- 26-Beautrais A.L. Child and young adolescent suicide in New Zealand. *Australian and New Zealand Journal of Psychiatry* 2001; 35: 647-53.
- 27-Weinberg I. The ultimate resignation: suicide and search activity. *Neuroscience & Biobehavioral Reviews* 2000; 24: 605-626.
- 28-Yazıcı S. Annelerin öz-bakım gücü, sağlıklı bebeklerin bakım sorunlarını çözme becerileri ve bu süreçte hemşirenin eğitici rolünün etkisi, Doktora tezi, İstanbul Üniversitesi Sağlık Bilimleri Enstitüsü, İstanbul. 1995.
- 29-Altun İ., Özdemir S. & Ersoy N. Sağlık Yüksekokulu öğrencilerinin kişisel değerlerinin öz-bakım güçlerine etkisi, VII. Ulusal hemşirelik Kongresi Kitabı, Atatürk Üniversitesi Hemşirelik Yüksekokulu 22-24 Haziran, Erzurum. 1999.
- 30-Schotter Bear D., Fisher L. & Gregory C. Dependent care, caregiver burden, hardiness and self-care agency of caregivers, *Cancer Nursing* 1995; 18: 299-305.
- 31-Fahs P.S., Smith B.E., Atav S. A., Britten M., Collins M.S., Morgan L.C. & Spencer G.A. Integrative research review of risk behaviors among adolescents in rural, suburban, and urban areas. *Journal of Adolescent Health* 1999; 24: 230-243.