Analyzing the Relationship between Family Functioning and Ego Resiliency with General Health in Women Suffering from Cancer

Hossein KayedKhordeh[1], Mohammad Parsamanesh[1]*, Hoda AminZadeh[1] and Akbar karamynorouzi[2]

[1.] Department of General Psychology, Islamic Azad University, Dezful Branch, Dezful, Iran.
[2.] Department of Educational Psychology, Islamic Azad University, Dezful Branch, Dezful, Iran.

* Corresponding author's Email: mohammad_ilyad63@yahoo.com

ABSTRACT: The current study has as its objective to analyze the relationship between family functioning and ego resiliency with general health in cases suffering from cancer. The present study is a correlational research. In this study 95 of women with cancer who were admitted in Namazi Hospital in Shiraz participated and were selected by convenience sampling in 1390. The data was gathered using questionnaires in family functioning, ego resiliency and general health and was analyzed using Spearman correlation and simple and complex regression test. According to findings, many aspects of family functioning are significantly correlated with general health. The most important findings were related to the aspects of communication, emotional involvement, overall function and behavior control which showed significant correlation with all aspects of general health (physical symptoms, social functioning, anxiousness and depression). Also according to the findings, ego resiliency can be an appropriate predictor of general health in cancer patients. Based on these findings it can be said that appropriate relations and functions in a family can play a role in improving the quality of life in cancer cases and it can be concluded that the cases with higher ego resiliency enjoy better general health levels.
Key words: General Health, Ego Resiliency, Family Functioning

INTRODUCTION

Despite considerable developments in medicine, cancer is a leading cause of morbidity and the second leading cause of death after cardiovascular diseases. This disease is diagnosed as abnormal deformation of cells and the loss of cell differences. With more than 100 malignant tumors, cancer can occur in all people in any age group, sex, ethnicity, race and socioeconomic group. All men have the potential to develop this disease and there are no exceptions (Smeltze and Bir, 2003). Cancer is a complication that can change the course of a person's life. The person with cancer cannot continue his life routinely and there are various problems for the people suffering from cancer in all aspects of personal, family and social life and will lead to dependency, lack of self-confidence and control, increased vulnerability and confusion, pain, physical symptoms and in all lowers the quality of life (Lukman, 2002). This disease hinders daily activities and social functions, tampers with a person's ability to perform routine responsibilities and roles, creating new roles. These people would not relate to their spouse, offspring, parents, siblings, friends and other members of their social network the way they used to. They are more or less dependent on others and are less able to support others since their personal interactions are limited with others and they can be isolated in the society. For this reason, their need of social support increases (Courtens et al., 1996).

The general health of cases with cancer is the focus of attention in this paper. One of the variables that are analyzed in this paper in relation with general health, is family functioning. The previous studies are indicative of a relationship between family functioning and different aspects of general health. Studies by Saadatmand (1997) and Mashhadizadeh (2002) have shown that there is a significance correlation between family functioning and general health and these can positively affect anxiety and depression levels. Also Shayer et.al. Has illustrated that poor functioning of a family will result in the depression of family members. In another study, Karbalo (1998) concluded that there is a significant correlation between internal relationships of family members and mental health. Another variable whose role in general health has been investigated in this study is ego resiliency. Ego resiliency is a positive adaptation in reaction to unpleasant situations. Indeed, ego resiliency is not only resistance against injuries or threatening conditions and is not a potentiality in facing hazardous situations, but also the active and constructive participation in the surrounding environment and it can be said that ego resiliency is a person's ability to maintain a biological-mental equilibrium under hazardous circumstances (Conner and Davidson, 2003). Regarding the consequences of ego resiliency, a number of studies have pointed at increased mental health and satisfaction with life (Silliman, 1994; Lazarus, 2004; Antonovsky, 1987). Researchers believe that ego resiliency is a type of self-treatment with positive exciting, emotional and

cognitive consequences (Garmezy, 1991; Masten, 2001; Ruter, 1999; Luthar et al., 2000).

Research Hypotheses

There is a relationship between family functioning and facets of general health.

The variables of ego resiliency and family functioning are predictors of general health.

MATERIALS AND METHODS

Participants and sampling methods: The present study is a correlational research. The sample population included women suffering from cancer in Shiraz City. In this study 90 of women with cancer who were admitted in Namazi Hospital in Shiraz participated and were selected by convenience sampling.

Instruments

Family Functioning Questionnaire (1983): The family functioning measurement instrument encompasses 53 questions based on Eloy McMaster's theory. This instrument was compiled by Epstein, Baldwin and Bishop in 1983 with the aim of describing organizational and structural characteristics of a family and measures the family's ability in self-adaptability and family tasks with a self-reporting scale. The participants indicated the degree of similarity between the described features and those of their own family by selecting one of the choices 'I completely agree', 'I agree', 'I disagree' and 'I disagree' in a Likert scale, giving each item a score of 1 to 4 with items describing unhealthy functioning receiving negative scores. In this sense, high scores were indicative of healthy functioning and low scores showed faulty functioning of a family. After compiling this questionnaire, Epstein et.al (1983) verified its validity and reliability in a pilot study on 503 participants. An alpha range of 0.72 to 0.92 is suggestive of high homogeneity of items. In the present study, reliability and validity of this questionnaire was calculated and with Cronbach alpha and Factor analysis, they were measured at 0.75 and 0.77, respectively.

General Health questionnaire (GHQ): The general health questionnaire has 28 items. The questionnaire items tend to assess the psychological state of a person in the previous month and this is done by clarifying signs such as abnormal thoughts and feelings and other facets of behavior. Subscales of this questionnaire are physical functioning, social productivity, anxiety and depression. The general health questionnaire, just like any GHQ form, is in form of multiple choice questions. In its original version the choices range form (much less than usual) to (less than usual), (just as always) and (more than usual) and scoring is based on a Liker scale of 4. In the present study, the reliability and validity of the general health questionnaire was measured by Cronbach alpha and factor analysis to be 0.70 and 0.82, respectively.

Ego resiliency (ER) scale: This scale includes 14 items in Likert scale. The Cronbach Alpha Coefficient of the total sample was reported at 0.76. In the current study, after translating the questionnaire to Farsi adhering to all rules regarding its psychological indices, it was administered to 90 women suffering from cancer. In the present study, reliability and validity of this questionnaire was calculated and with Cronbach alpha and Factor analysis, they were measured at 0.93 and 0.80, respectively.

RESULTS

In order to analyze the data, multi-variable regression analysis was used. Table 1 shows the results of correlation matrix between indices. In this study, the average score of participants was 70.45 for family functioning, 95.19 in ego resilience, 8.65 in physical functioning, 9.09 in anxiety, 8.26 in social functioning and 2.91 in depression scale.

In the current study, the Pearson correlation coefficient between family functioning and ego resilience and subscales of general health showed that there is a significant correlation at $p<0.01$. And there was a positive correlation between family functioning and social and physical functioning and a negative correlation between family functioning and depression and anxiety. Also there is a positive correlation between ego resilience and social and physical functioning and a negative one between ego resilience and depression and anxiety.

In order to predict the general health according to family functioning and ego resilience, multi-step regression model was simultaneously used. The β for family functioning was 0.38 and $p<0.001$ and the values for general health was significant and positive at β =0.35 and $p<0.01$. Thus the correlation coefficient of family functioning and ego resilience at 0.24 could predict about 0.49% of general health variance.

Table 1. Correlation matrix between variables

Variables and subscales	1	2	3	4	5	6	Mean	SD
1. Family functioning	1						70.45	12.18
2. Ego Resilience	0.44[xx]	1					95.19	17.28
3. Physical functioning	0.39[xx]	0.33[xx]	1				8.65	3.25
4. Anxiety	-0.41[xx]	-0.56[xx]	-0.63[xx]	1			9.09	3.26
5. Social functioning	0.42[xx]	0.60[xx]	0.50[xx]	-0.61[xx]	1		8.26	2.19
6. Depression	-0.31[xx]	-0.53[xx]	-0.44[xx]	-0.64[xx]	-0.45[xx]	1	2.91	1.45

Table 2. Multi-variable regression of general health on ego resilience and family functioning

Control variable	Prediction variable	B	T	Sig.	R	R²
General Health	Ego resilience	0.35	-2.64	0.01	0.24	0.49
	Family functioning	0.38	-3.05	0.001		

Table 3. Correlation Coefficients Matrix

Variables and subscales	1	2	3	4	5	6	7	Mean	SD
1. General functioning	1							31.73	5.74
2. Emotional support	0.55[xx]	1						2.11	1.31
3. Behavior control	0.71[xx]	0.42[xx]	1					10.69	2.41
4. Physical functioning	0.40[xx]	0.33[xx]	0.29[xx]	1				8.65	3.25
5. Anxiety	-0.43[xx]	-0.40[xx]	-0.39[xx]	-0.63[xx]	1			9.09	3.26
6. Social functioning	0.43[xx]	0.32[xx]	0.38[xx]	0.50[xx]	-0.61[xx]	1		8.26	2.19
7. Depression	-0.34[xx]	-0.29[xx]	-0.35[xx]	-0.44[xx]	0.64[xx]	0.45[xx]	1	2.91	1.45

Also the findings showed that among the different dimensions of family functioning, three facets of general functioning, emotional support and behavior control have been better predictors of general health.

DISCUSSION

The findings of this study like all other investigations in this regard are suggestive of a significant correlation between research variables. As table 1 showed, there is a positive correlation between family functioning and the physical and social aspects while there is a negative correlation between family functioning and depression and anxiety. About the first hypothesis it can be said that the more family functioning moves towards being healthy, the less social productivity is witnessed. Also the better a family functions in practicing emotional engagement, emotional support, role control, behavior control and problem solving, the more influential it will be in reducing behavioral and mental problems of its members and in reinforcing normalized and compatible behaviors. As some researchers in Toronto University (2005) believe, the joy of life for some people and their satisfaction from being alive is the most important potential and opportunity for them to enjoy a happy life with physiological and psychological happiness. Consulting families regarding functioning variables will result in improving functioning variables of quality of life and general health in cancer cases. The family is the focal context of maintaining the norms, social traditions and values and the strong foundation of social bonds. Repeated interactions will create patterns and models as to how and when a person can interact with others (Minoochin, 1996). Therefore it can be expected that the more efficient a family is in its functions especially in general functions, emotional support and behavior control, the more successful it will be in improving the general health indices in the cases and to reduce stress and anxiety. The families that are functioning poorly for their members are more likely to develop anxious behaviors like anger, phobia, disquietude and panic (Mashhadizadeh, 2002).

Depression is an emotional disorder that can have adverse effects in all aspects of life on the patients that unless taken care of, could lead to unpleasant results like suicide.

Regarding the second hypothesis, findings showed that ego resilience can be an appropriate predictor of general health. The findings of the present study have shown, similar to other studies, the positive role of ego resilience in the degree of general health (Silimen, 1994; Lazarous, 2004). Ego resilience affects the type of emotions and anxieties of individuals, leading to positive attitudes and eventually satisfaction from life. Reduction in a person's resilience to life events encounters him with a sort of mental pressure, anxiety or depression that is in concordance with the findings of Basu (2004) and Hamarat et al. (2001) who have reported dissatisfaction from life following such feelings in people. In other words, the first effects of improving ego resilience are reducing mental and anxious complications, improving the general health level and consequently a person's satisfaction from life. It may be possible to say that alterations in emotions will bring about a change of attitude about life and surroundings of a person. Considering the emphasis of experts on the learnability of different skills of resilience, with teaching these skills to cases, their level of mental health can be raised and hence increase their life satisfaction. As Sternberg and Bry (1994) puts it, with teaching the skills like communication, courage-giving and self-expression one can raise ego resilience and eventually the health level of individuals.

REFERENCES

Antonovsky, A. (1987). Unraveling the mystery of health San Francisco: Jossey-Bass.-

Basu, D. (2004). Quality-of-life issues in mental health care past, present, future. German Journal of Psychiatry, 735-43

Conner, K. M. & Davidson, J.R.T. (2003). Development of a new resilience scale: The Conner-Davidson Resilience Scale (CD-RISC). Depression and Anxiety, 18: 76-82.

Courtens, A.M.(1996).Stevens FCJ, Crebolder HFJM, Philipsen H. Longitudinal study and quality of life and social support in cancer. Cancer Nurse, (3): 162-169.

Garmezy, N. (1991). Developmental outcomes associate with poverty. American. Resilience and vulnerability to behavioral Scientist, 34: 416-430.

Hamarat, E., Thompson, D., Zabrucky, K. M., Steele, D. & Matheny, K. B. (2001). Perceived stress and coping resource: Availability as predictors of life satisfaction in young, middle-aged, and older adults. Experimental Aging Research, 27: 181-196.

Lazarus, A. (2004). Relationships among indicators of child and family resilience and adjustment following the September 11, 2001 tragedy. The Emory center for myth and ritual in American life. Available on www.marila.emory.edu/faculty/Lazarus.htm.

Lukman J. (2002). Text book of medical surgical nursing. Translated by Ebrahimi N. Tehran: Aeejeh, P: 285-290. [Persian].

Luthar, S. S., Cicchetti, D. & Becker, B. (2000). The construct of resilience: A critical evaluation and guidelines for future work. Child Development, 71543-562

Mashhadizadeh, M. (2002). Analyzing the relationship between family functioning and general health of children in aboriginal students of Yasouj Islamic Azad University, MA thesis, Tehran Teacher Training University.

Masten, A.S. (2001). Ordinary majic: Resilience processes in development. American Psychology, 56: 227-238.

Minoochin, S. (1996). Family and Family treatment, translated by Bagher Sanaei. Tehran: Amir Kabir.

Rutter, M. (1999). Resilience concepts and findings Implications for family therapy. Journal of Family: Therapy, 21: 119-144.

Saadatmand, N. (1997). Analyzing the relationship between family functioning and general health of children, thesis – Master's degree, Roudehen Islamic Azad University.

Silliman, B. (1994). Resilience review. Available on http://www.cyfernet.org/research/resilreview.html

Smeltze, R. & Bir, B. (2003). Brunner & Suddarths textbook of medical surgical pain, electrolit, shock, cancer and end of life care. Translated by Ebrahimi N et al. Tehran: Salemi; p: 179-180.

Sternberg, J.A. & Bry, B. H. (1994). Solution generation and family conflict over time in problem-solving therapy with families of adolescents: The Impact of therapist be havior. Child and Family Behavior Therapy, 16: 65-76.