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RESEARCH ARTICLE

KNOWLEDGE, ATTITUDE AND PRACTICE OF MIDDLE AGE AND ELDER WOMEN ABOUT SELF CARE IN HEALTH CENTERS OF AHVAZ, IRAN

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ABSTRACT

Background: Self-care is a multidimensional construct that includes all activities related to maintaining health, preventing and treating disease by themselves. Adoption proper behaviors needs good knowledge, perception and behaviors of individual. The aim of this study was to assess knowledge, attitude and practice of middle age and elderly women about self-care.

Methods: The study included 440 middle-aged and elderly women attending to public health centers in Ahvaz, Iran. Middle age and elderly women who were resident of Ahvaz were chosen from six health clinics. Women who resident of elderly house and who with disability were excluded from study. A questionnaire consisting of two parts (a-satisfaction with health, preventive factors, enabling factors, sources of information (b) improve the symptoms of menopause) was used to collect data.

Results: The mean age of middle age and elder women was 51.6% and 48.4% respectively. Only 34.5% of participants had a good performance in healthy lifestyle and self-care. Most of women had poor knowledge, attitude and practice regarding self care (69.6, 57.8%- and 88%- respectively). There was no significant relationship between age and the applied self-care activities to relieve menopausal symptoms.

Conclusions: The findings of this study showed that knowledge, attitude and practice of Iranian middle age and elderly women about self care were not satisfactory. Therefore there is need to some interventional program to improve the level of knowledge, attitude and practice of women about healthy lifestyle and self-care.

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INTRODUCTION

Self-care is a multi-dimensional structure that requires some behaviors which in turn are affected by factors such as health beliefs, economic situations and life events (Stys, 2007). Self care includes all activities related to maintaining health, preventing and treating disease by the individual (Gohar F 2008). Available evidences suggest that support for self-care reduces the number of visits related to primary and urgent cares (Department of Health 2006; Fritzell, 2007). Which subsequently leads to increase patient's satisfaction, higher quality of life and finally leads to improve the health system (Department of Health, 2006). There are many evidences that support the role of self-care as the most significant forms of primary care between developed and developing countries,

since approximately 65 to 85% of the care activities performed by individuals themselves or family members without medical help (Nilvaranykal, 2006; Yeom, 2002). But in some resources some risks for self-care has been mentioned. For example the person who use self-care, as a way of treatment, may not be aware of the nature of their problem and have not diagnosed it as well (Abootalebi and Daryasari 2012). Or he does not know about the ways of solving his problem well (Tinker, 2002). The population growth of elderly is a global phenomenon that has become a crisis. Presently, the population of elderly people above 60 is more than the population of children (Tonn, 2007; Donmez, 2005). According to the report of The United Nations Information Center in Tehran, in 2006, the population of elderly people was 4,562,000 that they were approximately six percent of the total population of Iran. It is estimated that this number will increase to 26,393,000 in 2050 (Kun, 2001).

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By aging, there are some changes in different aspects of elderly health including physical, mental and intellectual and other types of diseases manifestation. Therefore people are susceptible to decrease the quality of life and require observing and attention, and also having special care patterns (Rao, 2000; Mellor et al., 2008). Results of several studies have shown that by increasing the age due to limitations of motion, dependence of people on others for daily activities increases and this factor could have a large impact on the quality of life (Fassino, 2002; Salar, 2002; Hellström, 2004) And the elderly who must be helped in daily living have a lower quality of life (Demura, 2003) Two essential elements for maintaining and improving the quality of life of people, especially elderly and middle-aged are physical activity and mental health (Van Malderen, 2012). The change in lifestyles and attitudes to healthy living will be possible by enhancing self-care skills (proper nutrition, dietary supplements, exercise, weight loss, stress reduction, reducing fat, not smoking, reducing salt consumption, avoiding self-medication, consumption of fruits and vegetables in the daily diet, controlling blood pressure and increasing water consumption) (Shatenstein, 2007; Tannenbaum, 2007).

Despite numerous studies that have been conducted on the quality of life quality, especially the elderly this question is still un answered that what is the knowledge, attitude and practice of elderly and middle-aged people regarding self-care. Therefore this study was designed in order to evaluate the awareness, attitudes and practice of middle-aged and elderly women regarding self-care.

MATERIAL AND METHODS

In this descriptive study 440 middle-aged and elderly women attending to public health centers in Ahvaz were considered as participants. The basic design of this study approved in the Ethics Committee of University of Medical Sciences of Ahvaz (Reference code: 1392.284 ajums.rec.). According to obtained data from the studies (with regarding $P = 50\%$, $d = 5\%$) and the

given formula $n' = \frac{NZ^2P(1-P)}{d^2(N-1) + Z^2P(1-P)}$ 440 women

from four health - medical centers in the east of Ahvaz, and three centers from west of Ahvaz recruited randomly. Inclusion criteria included resident of Ahvaz, age 45 or higher, living with the spouse, children or others in the home. The exclusion criteria were mental and motion retardation and living in the nursing home. Written consent was obtained from all eligible participants. The research data were collected based on two questionnaires, one was the questionnaire used in British survey on the attitudes of people above 15 about self-care and another was a questionnaire made by researcher to assess self-care activities of middle-aged and elderly women to treat symptoms associated with menopause. The questionnaire consisted of two parts: the first part (a) consisted of four parts : Health (awareness, attitude and function), barriers toward self-care, health facilitators, self-care information resources and the second part (b) was including questions about menopausal symptoms and employed self-care to improve the symptoms. In section aof questionnaire, questions 3, 4 and 5 were related to knowledge, questions 9, 8, 7, 6 were related to attitude and question 10 was related to function. The Likert scale (five and

seven items) was used for scoring awareness and attitude when 1 dedicated to strongly disagree and 7 dedicated to strongly agree. For measuring practice the two items yes or no were utilized. The total score of questionnaire was considered 100. The validity of questionnaire was approved in other studies (4). To assess the reliability of researcher made questionnaire, the test- retest on 50 women who had inclusion criteria was used ($r = 0.84$). In this study the people who have had one of the behaviors such as drinking water more than seven glasses in a day, more than five pieces of fruit and vegetables in a day, or more than 3 hours walking per week, were considered as having a good practice in self-care. In according with self-care score, the participants were classified in two groups with scores higher or lower than 40 (the participants with scores higher than 40 were in the good self-care group and the participants with scores lower than 40 classified in the group with poor self-care). Data collection was run using interview and two of researchers who were fluent in Persian and Arabic done all interviews. Then data were entered into SPSS version 19 and descriptive and analytical tests (Chi-square and, Fisher exact and Spearman correlation and Wilcoxon tests) were used to analyze data.

RESULTS

In this study, 440 postmenopausal women with an average age of 58.10 ± 6.82 were recruited. 54.68% of them were illiterate and 84.31% of them were housewives. The mean duration of marriage was 37.78 and 13.46% of them had medical history and 42.5% of them had surgical history (Table 1). The findings showed that the average score of attitude in self-care was 24.3 ± 9.47 and 6.69% (306) of them had poor attitude (score less than 8). The average of awareness score of participants in self-care was 34.3 ± 17.9 and 8.57% (254 women) had poor awareness (scores less than 9). The mean score of practice was 51.1 ± 62.23 and 88% (387) of women had weak practice (scores below 24).

Table 1. Demographic characteristics of participants in the study

Variable	N(%) N=440	
Age group	Middle-age	227(51/6)
	Elder	231(48/4)
Mean age	58/10±6/8	
Marital status	Signal married	7(1/36)
	Widow	409(93/16)
	Illiterate	24(5/46)
	High school	21(54/68)
Level of education	Secondary high school	245(63/23)
	University education	53(12/04)
Employment status	General practitioner	38(8/63)
	Housewife	69(15/68)
Disease history	Yes	371(84/31)
	No	230(46/13)
Surgery history	Yes	237(53/86)
	No	187(42/50)
		253(57/50)

Using the spearman correlation there was a significant relationship between age and attitude ($r = 0.12$, $p = 0.012$), and also between income and attitude ($r = -0.247$, $p = 0.04$) and awareness ($r = -0.12$, $p = 0.2$). But there was no significant

relationship between awareness ($r = 0.022$, $p = 0/64$) and practice ($r = -0.025$, $p = 0/6$) in the self-care with age and practice, and income ($r = -0.178$, $p = 0.14$). Average score for the self-care in minor illnesses was 2.85 and in chronic illnesses was 3.16 therefore using Willcoxon statistical test with $P < 0/0001$, there was a significant relationship in the care of the illnesses. Around one third of participants (34.54%) stated that they often play an active role in directing healthy lifestyle of themselves (regular exercise, healthy food). There was a significant relationship between healthy lifestyle and the awareness - attitude and practice of the participants in the study (Table 2).

Table 2. The relation of healthy lifestyle with knowledge, attitude and practice of participants in the study

Healthy lifestyle	N(%)	Knowledge	Attitude	Practice
		P – value		
Drink more than seven cups of water a day	151 (37.46)	0/721	0/857	0/143
Eating more than five serving fruit or vegetable a day	115(28.53)	0/056	0/009	0/007
Walk more than three hours a week.	98 (24.31)	<0/0001	<0/0001	<0/0001
Regular exercise more than three hours a week.	39(9.67)	<0/0001	<0/0001	<0/0001

There were a significant difference between two groups by literacy (<0.0001), occupation (<0.0001), life satisfaction (<0.0001), active role in minor illnesses (<0.0001) and chronic diseases (<0.0001), active role in directing a healthy lifestyle (<0.0001), self-care skills as an enabling factor (<0.0001) and factors inhibiting in the use of self-care (lack of financial resources (<0.0001), lack of family support (<0.0001) lack of positive attitude (0.002) and lack of interest (0.006).

Table 3. Inhibitory, enabling and information resources people and information resources people participating in the research on self-care

Variables		Yes	No
		N(%)	
Barriers	lack of time	240(34/95)	197(62/05)
	Lack of financial resources	228(17/04)	210(82/96)
	Lack of knowledge (information and education)	183(13/67)	254(88/67)
	Lack of positive attitude	120(8/96)	315(91/04)
	Lack of support from family, friends and community	222(16/59)	218(83/41)
	self-reliance	105(7/84)	335(92/16)
	Lack of interest	110(8/22)	330(91/78)
	Other factors	130(9/71)	310(90/29)
Enabling factors	Encourage from family and service providers	367(34/95)	73(65/05)
	Need for home care equipment (blood pressure and glucometer)	251(23/90)	189(76/1)
	Self-care skills	260(24/76)	180(75/24)
	Other	172(16/38)	268(83/62)
Information sources	Physicians and health care providers	268(23/69)	172(76/39)
	Relatives, friends and colleagues	326(28/82)	114(71/18)
	Booklets and posters	117(10/34)	323(89/66)
	Media	224(19/80)	216(80/2)
	Internet organizations, health consecutive	90(7/95)	350(92/05)
	Other	106(9/37)	334(90/63)

The most important inhibiting and enabling factors for self-care were lack of time (93.17%) and family and service providers encourage (95.34%) respectively. Also the families, friends, co-workers (82.28%) and doctors - health service providers (69.23%) were the most important sources of information for the self-care (Table 3). The most important symptoms related

to menopause were hot flashes (29.10%) and vaginal dryness (99.5%) respectively. In this study there was no significant difference between age groups (middle and elderly) of participants in the research? and the applied self-care activities to relieve menopausal symptoms. Also among the self-care behaviors (reducing clothes, eating vitamin E, vitamin B6, hormone therapy therapy, etc.) only some activities of participants have been effective and there was a statistical significant difference between age groups by chi-square test (reducing clothes $p = 0.059$, the Kegal exercise $P = 0.01$, calcium supplements $P = 0.002$, hormone therapy $P = 0.04$).

DISCUSSION

In this study, the awareness, attitude and practice of middle-aged and elderly women who attended to health-medical centers of Ahvaz about self-care were studied. Findings showed that participants have poor attitudes, practice and awareness about self-care in acute and chronic illnesses. mentioned education as one of the effective factors in women's abilities (Ketabi *et al.*, 2003). The study of Swedish maternal health status showed that lower education have been associated with increase rate of mortality, poverty, unsuitable housing and undesirable health behaviors (Frizzell, 2003). In the study of Bydarloo *et al.* it was determined that there was a significant positive relationship between the attitude of diabetes patients with the purpose of their behavior (Didarloo *et al.*, 2011). This fact suggest that when a person has a strong believes in self-care for diabetes then this believes can leads to behavior. Orem believes that abilities and self-care needs in a healthy person are different proportional to the growth level which is determined by age (Coyle, 2000). In the present study there was a positive relationship between age and attitudes of participants and the young participants had more positive attitudes about self-care.

Kyle *et al.* Dashy *et al.* and Artin *et al.* found similar results in their studies (Akyol, *et al.*, 2007; Artinian *et al.*, 2002).

In our study 34.54% of individuals often had an active role in directing a healthy lifestyle and according to the research finding that there was a significant relationship between

awareness and practice of people about healthy lifestyle, it could be indicated that more awareness, education and training of people can increase the acceptable level of self-care, at least regarding healthy lifestyle. In the present study family and service providers' encourage was mentioned as the first enabling factor to enhance self-care. These results may be because of the fact that in Iran's health-medical system, education and training of patients and clients about the self-care are not sufficient. The role of support and education of doctors for promoting self-care also demonstrated in a study by others (Jaarsma et al., 1999). More than 13% of those who participated in the study believed that they had not sufficient information to perform self-care and also they demonstrated lack of information as one of the barriers for self-care. Therefore it seems that providing information and awareness for people who believe lack of awareness causes failure in self-care, can lead to improvement of self-care among them. This finding is consistent with results of study conducted in the Department of Health in England about self-care (Department of Health 2005) and other studies (Hoy, 2007; Phinney, 2008) but the difference is that in the study of Department of Health in England, most of people in England felt that they have sufficient knowledge and understanding of self-care. In this study the most important source of information about self-care was families, friends and colleagues, and secondly doctors and health providers.

While the study of the Department of Health in England showed that general physicians are the most important source of information and also internet and other communication devices such as digital televisions were valuable tools to support people. Furthermore it is possible that obtaining information about self-care by relatives and friends leads to non-standard and inaccurate information. The strength of this study was that the data were collected through interviews, so no questions remained without answer. The main important limitation of this study was that it was limited only to the middle-aged and elderly population attending to a health-care center, so the results cannot be generalized to all the middle-aged and elderly population of Ahvaz. Acknowledgements: This research work is approved by the Ahvaz University of Medical Sciences. Here, we appreciate the research deputy of Ahvaz Jundishapur University of Medical Sciences for financial support.

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