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Original Article

Assessment of Psychosocial Status and Spiritual Beliefs of a Sample of Infertile Men in Baghdad City/Iraq

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Abstract

Background: Infertility is considered one of the most important marital problems which may lead to separation between spouses, especially in male societies either by the request of the wife or negatively effect on the man's psyche, and in this case, the man initiates to terminate the married life, away from the painful situation he suffers. **Objective:** This cross-sectional descriptive study aims to identify the infertile men's personal-demographic characteristics, in addition to determine the psychosocial status and spiritual beliefs. **Materials and Methods:** The study consists of 150 patients selected randomly from the fertility center and infertility treatment/Kamal Al-Samurai hospital in Baghdad city, the data were collected by direct interview with those patients by using a questionnaire. **Results:** Most of the infertile men were at age group (20–30) years, duration of marriage (1–5 years), had primary infertility. As overall assessment, the study stated that the majority of the sample was in fair psychological condition, good social condition, and spiritual beliefs in good condition. In addition, the results show that no significant difference between some personal-demographical characteristics (age husband, duration of marriage, type of infertility, husband occupation, residential area, degree of relationship, smoking habit, take of medicines, chronic diseases, and erectile dysfunction) with psychological and social status. **Conclusions:** The problem of infertility is one of the most difficult problems facing newly married couples that cause negative psychological and social effects.

Keywords: Infertile men, psychosocial status, spiritual beliefs

Introduction

Infertility is a widespread problem. Infertility is the absence of pregnancy in the couple after a year and a half to marry with an unplanned intercourse and twice a week.[1]

Infertility may be primary when it is not preceded by any pregnancy or secondary when it follows a previous pregnancy even once, whether it ends with the birth of a live or dead fetus or ends with the abortion, and the inability to conceive during a year and a half of unprotected natural intercourse.[2] It's typically defined as the inability to achieve pregnancy after 1 year of unprotected intercourse.[3]

About (40%) of infertility problems are caused by abnormalities of the women's reproductive system, another (40%) of infertility due to male factor and the remaining (20%) is unexplained.[4]

Male infertility is a common and severe health problem. Infertility not only affects one's ability to have children but also has emotional, psychological, family, and societal effects. Despite the prevalence and significance of this health problem, resources and attention have not been sufficiently focused on this important issue.[5]

Approximately 7% of men suffer from infertility, and the incidence may be increasing. Of those affected, approximately 40% have idiopathic infertility. It is likely that the majority of those patients have genetic abnormalities that are the cause of their infertility. However, it is important to remember that there are genetic ramifications for essentially all infertile male patients. For example, it is likely that there are genetic predispositions to pathologies such as varicoceles, and environmental factors almost certainly modulate the

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underlying condition. The understanding of the genes involved in spermatogenesis, sperm maturation, and normal sperm function is key; however, we must also focus on better methods of accelerating advances into meaningful clinical diagnostic tests and therapies.[5]

Infertility generally means an inability to conceive; however, there are many reasons why you are not able to become pregnant, and many of these may be temporary. A diagnosis of infertility does not necessarily mean that you will always be infertile. It simply means that there is a problem that needs to be addressed. In the case of unexplained infertility, the more correct phrase should be "subfertile," because if given the right advice to boost your fertility, chances are you can become pregnant.[6]

Types of infertility

1. Primary infertility: Couples had never conceive at any stage before[7]
2. Secondary infertility: Couples have had a pregnancy although not necessarily a successful one.[7]

The psychological distress appears to be more common in the infertile couples. Most infertile patients especially women consider the evaluation and treatment of subfertility to be the most upsetting experience of their lives and the negative psychological impact of subfertility by many health providers and mental health clinicians is underestimated.[8]

Infertility is a serious problem, which leads to family separation. It affects women physically as well as psychologically. Person relationships, whether family relations, social life outside the family or reaction may become strained.[9]

Infertility in Iraq is increased, especially in the last 16 years (2000–2016) related to many factors, such as war, lifestyle, stress, smoking, occupation, eating behavior, and hereditary.[8]

These components are generated out of the World Health Organization's definition of health, as being dynamic state of complete physical, mental, social, and spiritual well-being and not merely the absence of disease or infirmity. Although estimates of the prevalence of infertility are not very accurate and vary from region to region, approximately (8%–10%) of couples experience some forms of infertility problem and (50–80) million people may suffer from infertility, (29–44) million of these infertile couples are Muslims, and (10%–15%) among Muslims in developing countries.[10]

The aim of the study was to determine psychosocial status and spiritual beliefs of infertile men, throw the light on association between psychosocial status and spiritual beliefs with some personal-demographic characteristics, and to find out any association between psychosocial status and spiritual beliefs.

Materials and Methods

A cross-sectional descriptive study was conducted in Baghdad city center of Baghdad governorate, which assessed psychosocial status and spiritual beliefs of the study sample. The study consists of 150 patients reviewers selected randomly from the fertility center and infertility treatment/Kamal Al-Samurai hospital in Baghdad city, and the data were collected, by direct interview with those patients by using a questionnaire form developed and constructed by the author after view on a panel of experts for validity of the study instrument. Know that, researcher made a formal request to the Ministry of Health and Environment for the approval of the study and facilitate task of data collection for this purpose.

A questionnaire consisting of two parts form: First part: this part concerned with personal and demographic characteristics.[11] Second part: this part concerned with specialized information's which includes three domains are as follows 1-Psychological domain, 2-Social domain, and 3-Spiritual beliefs domain.[12,13] Rating and scaling of the three levels (good, fair, and poor) was rated on the three points (Likert respondent scale) it was scored as (3) for always level, (2) for Sometimes level and (1) for never level to general good questions in all domains inspected of the respondents, while the scale was 1, 2, 3 for always, sometimes, and never, respectively, for the bad questions.[14,15] The collected data were analyzed using "SPSS-version 20" (Statistical Package for the Social Sciences, Baghdad, Iraq) after being coded. Data were presented in frequency and percentage. Statistical analysis was done using Chi-square test, the comprised of significates (P value) in any test were as follows: HS = Highly significant difference ($P < 0.01$), S = Significant difference ($P < 0.05$), and NS = Nonsignificant difference ($P > 0.05$) throughout the study.

Results

Table 1 clarified that the greater number of the infertile men (41.3%) who were at age group 20–30 years and most of the study sample (46.7%) duration of marriage was ranged between (1 and 5) years, (74.7%) had primary infertility, (46.0%) secondary or preparatory school, (52.7%) governorate employed, and (86.7%) from urban areas.

Table 2 depicted that the highest percentage (68.0%) affirms degree of relationship between husband and wife. The greatest proportion of them were (95.3%) did not exposed to radiation or a chemical, (56.0%) smokers, (99.3%) nondrinking alcohol, (62.0%) did not take of medicines (72.0%) had no chronic diseases, (100.0%) had no genital diseases, (56.0%) suffer from erectile dysfunction, (90.0%) their wives were known to have infertility.

Figure 1 shows that the majority of those infertile patients (68%) were in fair psychological condition, while the lowest proportion (22%) were poor condition, and the rest (10%) had good condition.

Results revealed that (59%, 38%, and 3%) of study sample had (good, moderate, and poor) condition, respectively. Concerning spiritual beliefs, results found that the vast majority of infertile men (96%) had a good condition, while (4%) were in moderate status.

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Table 1: Distribution the study sample according to demographical characteristics

Variables	Groups	*n* (%)
Age husband	20-30	62 (41.3)
	31-40	59 (39.3)
	41-50	23 (15.3)
	51-60	6 (4)
	Total	150 (100)
Duration of marriage	1-5	70 (46.7)
	6-10	55 (36.7)
	11-15	15 (10)
	16-20	10 (6.7)
	Total	150 (100)
Type of infertility	Primary	112 (74.7)
	Secondary	38 (25.3)
	Total	150 (100)
Level of husband education	Illiterate	2 (1.3)
	Able to read and write	3 (2)
	Primary school	30 (20)
	Secondary or preparatory school	69 (46)
	Undergraduate	43 (28.7)
	Postgraduate	3 (2)
	Total	150 (100)
Husband occupation	Governorate employed	79 (52.7)
	Retired	3 (2)
	Self-employed	61 (40.7)
	Unemployed	7 (4.7)
	Total	150 (100)
Residential area	Rural	20 (13.3)
	Urban	130 (86.7)
	Total	150 (100)

The findings out in Tables 3-5 refer to the relationship between some personal-demographical characteristics and overall assessments due to psychological status, social status, and spiritual beliefs. Regarding psychological and social aspect, the Tables 3 and 4 shows that no significant difference between variables except the number of times sex only record a significant difference. Whereas, spiritual beliefs of Table 5 were a HS difference such as (level of husband education, drink alcohol, your wife knows that you are infertile), while the rest of characteristics shows nonsignificant difference.

Table 6 shows that association between psychological aspect with spiritual beliefs toward infertile men, which found that there was a significant relation; but association was a nonsignificant difference relative to social aspect.

Discussion

The results observed that higher rate of the infertile men (41.3%) at age group (20–30) years, it seems that the reviewers about the issue of infertility from this age group, which was ranked highest is the stage of concern and the husband feels the need to reproduce and fear of not having children. While, the lower percentage of them (4.0%) was at age group between (51-60) years, because this group seems

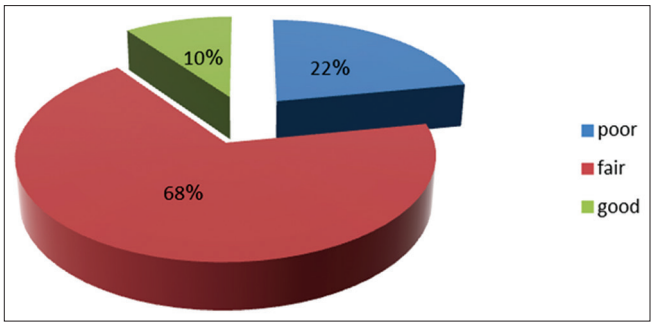

Figure 1: Distribution of study sample according to psychological status

to reach to the stage of despair , which has no hope of having children after this age. These results agree with the findings of AL-Ani.[16] About duration of marriage and type of infertility, the findings presented that most of the study sample (46.7%) duration of marriage was ranged between (1 and 5) years, (74.7%) were had primary infertility, most of the patients during this period of marriage because they make the family more interconnected, these results agreement with several authors.[11,17] Relative to level of education and occupation, the majority of the husbands (46.0%) graduated from secondary or preparatory school, (52.7%) governorate employed. Finally, the results showed that more than three-thirds of patients (86.7%) were from urban areas. Moreover, other factors such as level of education, occupation, and residential area are associated with the quality of marital status. Further, these results agree with the several studies.[16,18] The findings show that the highest rate (68.0%) affirms degree of relationship between husband and wife, could due to the traditions and social customs, and it's agreed with Ghafel[8] this suggests that the genetic factor may be related to infertility. The greatest proportion of them were (95.3%) did not expose to radiation or a chemical, (56.0%) smokers, (99.3%) nondrinking alcohol, (62.0%) did not take of medicines (chemical or chronic diseases). The study was in agreement with the work of Abdul Salam.[11]

Most of the study samples (72.0%) had no chronic diseases whereas <1 quarter (28.0%) suffering from these diseases related with diabetes (14.0%), blood pressure (4.7%), diabetes and blood pressure (4.7%), heart diseases (2.0%), heart diseases and blood pressure (2.0%), and stomach and bowel ulcer (0.7%), this is a clear indication of the link between these diseases and infertility.[1] However, the results stated that the vast majority were (100.0%) had no genital diseases, because Iraqi society is a conservative Islamic society, and more than half of the patients were (56.0%) suffer from erectile dysfunction, these findings are similar to those of Abdul Salam.[11] Eventually, the results demonstrated that the majority of the infertile men (90.0%) their wives were known to have infertility, this is normal due to the privacy of the husband. This interpretation had an agreement with the results of Abdul Salam.[11]

Regarding to psychological status, the results show that the majority of these infertile patients (68%) were in moderate psychological condition, while the lowest proportion (22%)

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Table 2: Distribution of the study sample regarding indirectly information related to the study

Variables	Groups	*n* (%)
Degree of relationship between husband and wife	Yes	102 (68)
	No	48 (32)
	Total	150 (100)
Have been exposed to radiation or a chemical	Yes	7 (4.7)
	No	143 (95.3)
	Total	150 (100)
Smoking habit	Yes	84 (56)
	No	66 (44)
	Total	150 (100)
Drink alcohol	Yes	1 (0.7)
	No	149 (99.3)
	Total	150 (100)
Take of medicines	Yes	57 (38)
	No	93 (62)
	Total	150 (100)
Type of treatment	Chemical	25 (16.7)
	Chronic diseases	32 (21.3)
You have chronic diseases	Yes	42 (28)
	No	108 (72)
	Total	150 (100)
Type of disease	Heart diseases	3 (2)
	Diabetes	21 (14)
	Blood pressure (hypertension)	7 (4.7)
	Heart diseases and blood pressure	3 (2)
	Diabetes and blood pressure	7 (4.7)
	Stomach and bowel ulcer	1 (0.7)
With genital diseases such as: AIDS, gonorrhea	Yes	0
	No	150 (100)
	Total	150 (100)
Suffer from erectile dysfunction	Yes	84 (56)
	No	66 (44)
	Total	150 (100)
Number of times of sex	Once a week	35 (23.3)
	Twice or more a week	57 (38)
	Once a month	20 (13.3)
	Twice or more a month	38 (25.3)
Your wife knows that you are infertile	Yes	135 (90)
	No	15 (10)
	Total	150 (100)

Table 3: Association between some personal-demographical characteristics and overall assessments due to psychological status

Some personal-demographical characteristics	Psychological status	
	χ^2 and *P*	CS
Age husband	1.810 and 0.936	NS
Duration of marriage	7.165 and 0.306	NS
Type of infertility	3.956 and 0.138	NS
Level of husband education	14.695 and 0.144	NS
Husband occupation	6.970 and 0.324	NS
Residential area	3.832 and 0.147	NS
Degree of relationship between husband and wife	3.597 and 0.166	NS
Smoking habit	4.423 and 0.110	NS
Drink alcohol	3.569 and 0.168	NS
Take of medicines	2.299 and 0.317	NS
You have chronic diseases	2.407 and 0.300	NS
Suffer from erectile dysfunction	2.427 and 0.297	NS
Number of times of sex	13.243 and 0.039	S
Your wife knows that you are infertile	3.755 and 0.153	NS

S: $P<0.05$, NS: $P>0.05$. CS: Comparison significant, S: Significant, NS: Not significant

Table 4: Association between some personal-demographical characteristics and overall assessments due to social status

Some personal-demographical characteristics	Social status	
	χ^2 and *P*	CS
Age husband	6.941 and 0.326	NS
Duration of marriage	8.458 and 0.206	NS
Type of infertility	0.791 and 0.673	NS
Level of husband education	7.734 and 0.655	NS
Husband occupation	7.888 and 0.246	NS
Residential area	3.397 and 0.183	NS
Degree of relationship between husband and wife	0.632 and 0.729	NS
Smoking habit	0.716 and 0.699	NS
Drink alcohol	1.643 and 0.440	NS
Take of medicines	0.026 and 0.987	NS
You have chronic diseases	0.166 and 0.920	NS
Suffer from erectile dysfunction	1.204 and 0.548	NS
Number of times of sex	13.554 and 0.035	S
Your wife knows that you are infertile	2.577 and 0.276	NS

S: $P<0.05$, NS: $P>0.05$. CS: Comparison significant, S: Significant, NS: Not significant

was poor condition, followed by (10%) good condition. In light of these results, the assessment of the mental state of men with infertility is reported bad or negative assessment. Because infertility causes psychological disorder, disorientation, poor compatibility with others, emotional problems with the partner of life, lack of joy, and pleasure due to lack of reproduction, as well as the desire to maintain family life, causes psychological problems. These findings were comparable with several authors who revealed that anxiety, anger, distress, grief, depression, and loneliness can occur in many men with infertility, these results reported that statistically bad (negative) assessment.[19,20] These studies agreed with the findings of our study.

In addition, the same results were supported by Dyer *et al*.[21] Related to social status, majority of the infertile men (59%) were in good condition, (38%) with fair status, followed by (3%) was poor condition. Since the good condition did not achieve half or more in the light of the study sample, this does not mean that the social situation is at an ideal level. The social situation comes from the severe psychological impact

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Table 5: Association between some personal-demographical characteristics and overall assessments due to spiritual beliefs

Some personal-demographical characteristics	Spiritual beliefs	
	χ^2 and *P*	CS
Age husband	3.636 and 0.304	NS
Duration of marriage	1.912 and 0.591	NS
Type of infertility	2.121 and 0.145	NS
Level of husband education	16.697 and 0.005	HS
Husband occupation	0.732 and 0.866	NS
Residential area	0.060 and 0.806	NS
Degree of relationship between husband and wife	0.675 and 0.411	NS
Smoking habit	0.091 and 0.763	NS
Drink alcohol	24.161 and 0.000	HS
Take of medicines	1.207 and 0.272	NS
You have chronic diseases	2.431 and 0.119	NS
Suffer from erectile dysfunction	1.303 and 0.254	NS
Number of times of sex	4.558 and 0.207	NS
Your wife knows that you are infertile	11.111 and 0.001	HS

HS: $P<0.01$, NS: $P>0.05$. CS: Comparison significant, NS: Not significant, HS: Highly significant

Table 6: Association between overall assessments of spiritual beliefs and psychosocial status

Domains	Spiritual beliefs	
	χ^2 and *P*	CS
Psychological status	7.398 and 0.025	S
Social status	4.254 and 0.119	NS

S: $P<0.05$, NS: $P>0.05$. CS: Comparison significant, S: Significant, NS: Not significant

of infertility, especially in the Arab world, where humanhood is sometimes measured by the number of children where reproduction is of paramount importance to strengthen intimate relationship between spouses and establish family ties between them and their relatives. As a matter of fact, Ramzy[22] observed that the infertile man cannot even discuss his problem with his family and friends, as this will make him less of a male in their eye. At this stage, this affects his work and social life, especially among friends, this result is in line with the present study. Moreover, this study is almost agree with a study done by several studies worldwide.[23,24] Infertility is a disease of God Almighty, which may affect any man or woman for causes genetic, hormonal, inflammatory, immunological and is subject to successful treatment in most of these cases. Concerning spiritual beliefs, the results indicated that the vast majority of infertile men (96%) were in good condition, followed by (4%) had moderate status; the results in this study reported very good or positive assessment, for all of them were secure in the judgment of God and his fate, and that what happened to them was only for wisdom, which only God knows. In general, these results were coincided with several studies conducted worldwide.[25,26] In addition, other authors demonstrated that most of the study sample had faith in Allah, which strongly agrees with the present study.[11,27]

The findings out in Tables 3-5 refer to the relationship between some personal-demographical characteristics and overall assessments due to psychological status, social status, and spiritual beliefs toward infertile men individuals. Table 3 shows that regarding to psychological aspect found relationship is accounted with no significant difference between final outcomes concerning psychological status with study sample variables except number of times of sex only which showed a significant difference. Thus, Table 4 observed the same results for the social situation too, may be the infertility was physical condition and not a psychological or social, and that the psychological state is the result of the disease has nothing to do with the personal and demographic characteristics of the person himself. Overall, results of our study agree with several authors who stated that the most of relationships were a nonsignificant difference,[8,28] these results were strongly agreed with the previous study. While, in comparison with another study done by Abdul Kadir showed that some variables were a HS difference,[12] which disagree with this study, because may be due to difference between gender or community from the side of personal-demographical characteristics and their relation to these aspects.

Regarding spiritual beliefs, the results in Table 5 illustrated that some variables were HS difference such as (level of husband education, drink alcohol, and your wife knows that you are infertile), because the learner is more knowledgeable in God (subhanah wataealaa) than the uneducated by following the teachings of religion and avoiding sin. While, the rest of characteristics were a nonsignificant difference, as that reported by other authors.[11,29] However, association between psychological aspect with spiritual beliefs found that there was a significant relation; however, association was a nonsignificant difference relative to social aspect with spiritual beliefs. Unfortunately, no supportive evidence was available in the literature with regard to this relation in comparison with our study.

Conclusions

Most of the infertile men were at age group (20–30) years, duration of marriage (1–5) years, had primary infertility, graduates secondary or preparatory school, governorate employed, from urban areas. Majority of the study sample were in fair psychological condition, good social condition, and spiritual beliefs in good condition. Most of the results indicated that there was no significant difference between some personal-demographical characteristics with psychosocial status and spiritual beliefs.

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Conflicts of interest

There are no conflicts of interest.

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References

1. Robert MC, Roger C, David M, Douglas L, Gordon B, Gab K. Male Infertility. A Booklet in the Series of Consumer Guides on Male Reproductive Health From. 4th ed. Andrology Australia (The Australian Centre of Excellence in Male Reproductive Health). The effectiveness of infertile women's commitment to implement in vitro fertilization protocols in Kamal Al-Samaraee Hospital/ fertility and IVF center, published in College of Nursing, University of Baghdad, Iraq; 2014. p. 15-6.
2. Hamza S. Infertility (Causes and Treatment). The National Centre for the Distinguished. Assessment of Quality of Life for Infertile Men, Published in College of Nursing, University of Baghdad, Iraq; 2015. p. 5.
3. Infertility. An Overview. American Society for Reproductive Medicine. Female Infertility: A Study on Risk Factors, Iraqi Authority for Medical Specialties, Scientific Council of Community Medicine, Baghdad, Iraq; 2012. p. 3.
4. David L. Infertility. United States of America (U.S.A.): Assessment of Quality of Life for Infertile Men, published in College of Nursing, University of Baghdad, Iraq; 2002. p. 1-3.
5. Douglas T. The Genetics of Male Infertility. Assessment of Quality of Life for Infertile Men, published in College of Nursing, University of Baghdad, Iraq; 2007. p. 1.
6. Glenville M. Understanding Fertility and Infertility E-book. Assessment of psychosocial aspect of infertile women in Erbil-Iraq, published in college of nursing, university of Salahaddin, Iraq; 2013. p. 2-36.
7. Ibrahim A, Shukri Othman M, Nik Muhamad Afendi NR. A Quick Guide to the Management of Infertility. Male infertility factors in a sample of Iraqi males, published in scientific council of community medicine, Baghdad, Iraq; 2011. p. 9.
8. Ghafel H, Ali R, AL-Rahawi A. The effectiveness of infertile women's commitment to implement *in vitro* fertilization protocols in Kamal Al-Samaraee hospital/fertility and IVF center. Published Univ Baghdad Coll Nurs 2016;2:9-14.
9. Zhijie Y, Aulikki N, Erkki V, Guide S, Zeyu G, Gengwen Z. Associations between socioeconomic status. Bulletin of the World Health Organization 2000;78:1296-305.
10. Serour G. Bioethics in Infertility Management in the Muslim World. United States of America (U.S.A): Assessment of psychosocial aspect of infertile women in Erbil-Iraq, published in college of nursing, university of Salahaddin, Iraq; 2002. p. 1-5.
11. Abdul Salam M. Assessment of Quality of Life for Infertile Men. Published in University of Baghdad-College of Nursing, Baghdad, Iraq; 2004. p. 72-128.
12. Abdul Kadir H. Assessment of psychosocial aspect of infertile women in Erbil-Iraq. Published Univ Salahaddin Coll Nurs 2005;27:43-70.
13. World Health Organization Quality Of Life Group. What is quality of life? World Health Forum 1999;17:354-6.
14. Polit O, Hungler B. Nursing Research Principles and Methods. 6th ed. Philadelphia: Lippicottco; 1999. p. 187-92.
15. AL-Nasrawii M. Rights' and responsibilities among hospitalized patients' in Karbala city/Iraq. Karbala J Med 2017;10:2756-63.
16. AL-Ani A. Male Infertility Factors in a Sample of Iraqi Males. Published in Scientific Council of Community Medicine –Baghdad/Iraq; 2000. p. 28-33.
17. Ziad H, Qais A, Mahasin A. Clinical patterns and major causes of male infertility in Fallujah city. Anb Med J 2016;13:96-106.
18. Fahimeh S, Mojgan M, Marieh R. Perceived stress and its social-individual predicors among infertile couples referring to infertility center of Alzahra hospital in Tabriz/Iran. Int J Womens Health Reprod Sci 2014;2:291-6.
19. Ratnkar J. Female infertility. India News 2002;8:1-2.
20. Tarken L. The Emotional Stress of Infertility. Vol. 10. The New York Times/United States of America (U.S.A); October, 2002. p. 1-2.
21. Dyer S, Lombard C, Van der Spuy Z. Psychological distress among men suffering from couple infertility in South Africa: A quantitative assessment. Hum Reprod 2009;24:2821-6.
22. Ramzy A. Religious and Cultural Background and its Impact on the Reaction to Male Infertility in the Arab Countries/Egypt. Male Infertility Factors in a Sample of Iraqi Males, Published in Scientific Council of Community Medicine – Baghdad, Iraq; 2004. p. 1-3.
23. Zoldbrod A. The Male Crisis in Understanding and Reacting to Infertility/United States of America (U.S.A). Assessment of Quality of Life for Infertile Men, Published in College of Nursing, University of Baghdad, Iraq; 2001. p. 1-7.
24. The National Infertility Association (NIA): Infertility/United States of America (U.S.A). Male Infertility Factors in a Sample of Iraqi Males, Published in Scientific Council of Community Medicine – Baghdad, Iraq; 2001. p. 1-4.
25. Bixler S. Desires of the Heart/United States of America (U.S.A). Assessment of Quality of Life for Infertile Men, Published in College of Nursing, University of Baghdad, Iraq; 2004. p. 1-3.
26. Kohn R. Do You Think Infertility is A Punishment From God/United States of America (U.S.A); 2003. p. 1-2.
27. Jafarzadeh-Kenarsari F, Ghahiri A, Habibi M, Zargham-Boroujeni A. Exploration of infertile couples' support requirements: A qualitative study. Int J Fertil Steril 2015;9:81-92.
28. Fisher JR, Hammarberg K. Psychological and social aspects of infertility in men: An overview of the evidence and implications for psychologically informed clinical care and future research. Asian J Androl 2012;14:121-9.
29. Joana R, Sílvia C, Vivienne B, Jenny H, Fiona T. The spiritual journey of infertile couples, discussing the opportunity for spiritual care (Article)-London/England. Religions J 2017;8:2-14.