

Sexual Health and Reproductive Ageing among Rural Women of Marrakech (Morocco)

R. Lotfi, M. Loukid, M.K. Hilali

Abstract—The reproductive aging of women is a biological process which is expressed by the loss of ovarian function and therefore the loss of the possibility of procreation.

The present work aims to evaluate the effect of menopause on sexual health of rural women and to examine the determinants of female sexuality after menopause. A survey was conducted among 527 women in the rural area of Marrakech.

The average age of women was 51.92 ± 7.24 years. It appears from this study that sexual activity in menopausal women decreases with age, 20% of women had no sexual activity after menopause. 72% of respondents reported having sex by obligation, 71% of women say they are not satisfied with their sexuality, while 29 % are very satisfied. The most common sexual complaints are represented by the decreased libido (81%), vaginal dryness (54%), and pain (22,7%). Of the 511 women with sexual dysfunction, only 34 (6, 4%) consulted for this disorder.

Many factors may influence sex include menopause and all the biological changes but also the roles of culture, social constructions and perception of sexuality after menopause are complicated.

Keywords—Reproductive aging, menopause, sexuality, rural women.

I. INTRODUCTION

THE reproductive aging of women is a biological process which is expressed by the loss of ovarian follicular activity and therefore the loss of fertility. This situation generates biological complex changes that mixes environmental (social and cultural) and biological (morphological, physiological and biochemical) determinants.

Menopause is a good marker of the aging process breeding. Some authors have even suggested it as a good biological indicator of general health and aging [1].

Reproductive aging cannot be understood otherwise a sequence particular process that is slower biological aging [2]. It appears, therefore, as the result of the expression of the influence of ecological conditions in which took place in the woman's reproductive life [3].

However, Sexual health can take an important part of women's life [4], with all the physical and psychological changes of menopause that affect quality of life, and general well being.

The social and cultural background of women shapes her perception to the menopause [5], as well as her attitude regarding sexuality and intimate relations. Discussing on

sexuality is always a difficult topic which represents not only a sensitive and personal area but also a social taboo.

There are a number of factors that can occur on sexuality, and making the study difficult [6], including ageing, hormones, physical health, mental health, medication, education, psychosocial stress and others [7].

Very few studies have evaluated sexual health among women through the reproductive ageing. The purpose of this study is aims to evaluate the effect of menopause on sexual health of rural women of Marrakech describe the nature and prevalence the sexual symptoms and also examine the role of some factors on the sexuality of female among and after menopause.

II. MATERIALS AND METHODS

This study presents the results of a survey, carried out in the rural area of Marrakech, about sexual health related to the reproductive ageing of women. The enquiry is based on a cross-sectional method. The sample constituted, in the rural area of Marrakech, contains 527 women aged 40 years and plus. The basis of work is represented by a card questionnaire.

The questionnaire collects information on the woman's socioeconomic context, and on her sexual health.

In this paper were processed in basis of the women who reported sexual activity.

The menopausal status include Premenopausal subgroup that present women with regular menstruation and natural menopausal subgroup included women who had no menstruation for at least one year, and as defined by the Stages of Reproductive Aging Workshop (STRAW) [8], we have divided the menopausal subgroup into two others groups, the menopause: 5 years following the last menses (early menopause) and the postmenopause: lasting from 5 years of menopause (late menopause).

The recruitment of women is randomly among the female clients of healthcare centers. Ages cover the entire affected perimenopausal period. The women also were informed of the objectives of the survey, to respond freely and without any constraint to personal concerns.

The Statistical Package for the Social Sciences (SPSS) version 10.0 was used to analyze the data, which included descriptive statistical analysis and testing of the research questions. The level of significance used was $p < 0.05$.

III. PARTICIPANT'S CHARACTERISTICS

The mean age of the participants women was 51.92 ± 7.24 , range from 40 to 72 years. Table I present the

sociodemographic characteristics of the study group. This table shows that the overwhelming majority of women were currently married, homemakers and nonliterate by respectively 92.8%, 92.2% and 98.1%. The employed rural women were engaged as artisan or labor. 89.6% of women were married before the age of 18, and more than half of women had a number of children higher than 4 child. 35.4% of the study population were premenopausal, 33.9% were menopausal while 30.7% were postmenopausal.

The use of oral contraceptive pills concern 52.5% of surveyed women. The majority of women (90.3%). have never checking-up for a problem of sexual dysfunction.

TABLE I
 RESPONDENTS' SOCIOECONOMIC AND DEMOGRAPHIC CHARACTERISTICS

Characteristics	n	%
Age in years		
40-45	110	20.8
45-50	121	22.9
50-55	109	20.6
55-60	106	20.1
>60	82	15.5
Marital status		
married	490	92.8
remarried	38	7.2
Occupation of women		
Homemaker	508	92.2
Employed	19	7.8
Education of women		
Nonliterate	518	98.1
literate	10	1.9
Age at marriage		
< 18	473	89.6
≥ 18	55	10.4
Numbers of children		
0 to 2	42	8
2 à 4	162	30.7
>4	316	59.8
Menopausal status		
Premenopause	187	35.4
menopause	179	33.9
Postmenopause	162	30.7
Use of oral Contraceptives pills		
yes	277	52.5
no	250	47.4
Physician check-up for sexual dysfunction		
yes	477	90.3
no	34	6.4

A. Prevalence of Sexual Symptoms

Most studies on sexual health reported that age is related with menopause. The prevalence of sexual and urogenital symptoms is summarized in Table II. It shows that among participants, the loss of libido or desire was the symptom which most women suffer from (81%), followed by pain during sexual activity (77.1%) and sexual satisfaction (71%) while the urogenital symptoms is expressed by vaginal dryness and urinary incontinence for 54 % and 20, 8 % of women respectively.

Our result revealed an important prevalence of sexual dysfunction in middle-aged; these findings are similar with results concluded by [9]. According to [10] among the most common sexual complaints we find the loss of libido and painful intercourse determined in our search. In Morocco very

few studies have been brought about sexual life of menopausal women, we reported, the result of [11] in urban area of Marrakech, who report that 51.2% of women struggling likely than rural women in our study the loss of libido, while [12] in a similar study concerning the Moroccan women population, only 20% of women expresses loss of desire.

TABLE II
 DISTRIBUTION OF PARTICIPANT WOMEN'S SEXUAL DYSFUNCTION (N= (527)

Symptoms		n (%)
Loss of Libido	Yes	432(81)
	No	95(18)
Sexual satisfaction	Yes	153(29)
	No	375(71)
Vaginal dryness	Yes	285 (54)
	No	241(45.6)
Pain	Yes	120(22.7)
	No	407 (77.1)
Urinary incontinence	Yes	110(20.8)
	No	417(79)

B. Sexual Dysfunction and Menopausal Status

The association between symptoms of sexual dysfunction and menopausal status of women was presented in Table III. This association was determined statistically significant between the menopausal status and all the sexual dysfunction symptoms.

Table III summarizes that Loss of libido, vaginal dryness, pain and urinary incontinence are more frequent among both menopausal and post menopausal women rather than among the premenopausal women. For the sexual satisfaction the premenopausal women felt likely more satisfied by their sexual activity than the menopausal women

According to [13] menopause was found as an important factor that affects sexual function of woman.

Some researchers indicated that rather than hormonal changes, psychological and social ones may also affect the decreased sex with age [14]-[16]

Others hypothesize determined that sexual activity decreases with age because of cultural expectations and also husband's sexual functioning [17].

Furthermore, this topic in the rural area of Morocco is still affected by the sociocultural context and women's perspectives about sexuality after menopause even if that affects not only their marriage relationship but also their health. In our survey 20% of women were reported had no sexual activity after menopause. 72% of respondents reported having sex by obligation.

While only 8% had no problem in her sexual life after being menopausal.

TABLE III
ASSOCIATION BETWEEN SEXUAL DYSFUNCTION SYMPTOMS AND MENOPAUSAL STATUS OF WOMEN

Symptoms	Menopausal status			p-value*
	Premenopausal	Menopausal	Postmenopausal	
Loss of Libido	134 (71.7)	159 (88.8)	139 (86.3)	0.000 s
Sexual satisfaction	73 (39.0)	40 (22.3)	40 (24.7)	0.001s
Vaginal dryness	85 (45.5)	100 (55.9)	100 (62.5)	0.006s
Pain	27 (14.4)	44 (24.6)	49 (30.4)	0.001s
Urinary incontinence	25 (13.4)	41 (22.9)	44 (27.3)	0.015s

Results are presents as number and percentage
* P-values are based on chi-square test; s: significant.

TABLE IV
ASSOCIATION BETWEEN THE SEXUAL SATISFACTION AND SOME BIODEMOGRAPHIC FACTORS

Variables	Sexual satisfaction		p-value*
	NO	YES	
Marital status			
married	347 (70.8)	143 (29.2)	0.009s
remarried	10 (50)	10 (50)	
Occupation of women			
Homemaker	364 (71.5)	145 (28.5)	0.37 ns
Employed	161 (30.5)	383 (72.4)	
Age at marriage			
< 18	340(71.9)	133 (28.1)	0.202 ns
>= 18	35 (63.6)	20 (36.4)	
Number of children			
0 to 2	34 (81)	8 (19)	0.343 ns
2 to 4	114 (70.4)	48 (26.6)	
>4	222 (70.3)	94 (26.7)	
Use of oral Contraceptives pills			
yes	184 (75.4)	60 (24.6)	0.039 s
no	191(67.3)	93 (32.7)	

Results are presents as number and percentage
*P-values are based on chi-square test; ns: non-significant; s: significant.

C. Sexual Satisfaction and Biodemographic Factors

The association between sexual satisfactions as a one of complaints of sexual problems among the menopause period and some biodemographic factors is presented in Table IV. It seems that married, employed, women having more than 4 child and women who never used oral contraceptives are more satisfied in sexual life than the others.

However, this association was statistically significant with marital status and the use of oral contraceptives, while no signification was found with the marital status, occupation of women, age at marriage and the number of children.

A number of studies indicated that cultural environment [18], female identity [19], and may be also the sexuality perception have a big impact on the most sexual problems.

IV. CONCLUSION

Menopause is a period of transition which can lead to a path depression or another chance for a healthy life.

In our study we have unveiled a sensitive taboo in the life of the woman in menopause; we have also revealed a high prevalence of sexual problems among women in pre- and postmenopause. For the interest of reproductive ageing process to maintain a good quality of life for women especially in rural area we suggest the importance of documenting in how women interpret sexuality changes and also the role of awareness and supporting during and after menopause.

ACKNOWLEDGMENT

The lead author expresses her gratitude to the women who participated in this study, who had pleased to share personal and intimate information and also a special *thank* for all those who have helped in carrying out the research.

REFERENCES

- [1] D. Snowdon, R. Kane, W. Besson, G. Burke, J.Sprafka, J. Potter, H. Iso, D. Jacobs, R. Phillips, Is early natural menopause a biological marker of health and ageing? *Am. J. Public Health*, 79 (6): 709-714, 1989.
- [2] C. Bernis, Ecologia del envejecimiento reproductor: una vision global. Conferencia au Workshop « Ecologia del envejecimiento reproductor », Madrid, 2001.
- [3] C. Varea, C. Bernis, P. Montero, S. Arias, A. Barroso , B. Gonzalez, Secular trend and intrapopulational variation in age at menopause in Spanish women. *J. Biosoc. Sci.*, 32 (3): 383-393, 2000.
- [4] Margaret R.H. Nusbaum, R. Helton Margaret, R. Neepa, The changing nature of women's sexual health concerns through the midlife years, *Maturitas* 49,283-291, 2004.
- [5] M. Lock, Menopause in cultural context, *Exp Gerontol*; 29: 307-317, 1994.
- [6] L. Dennerstein, JL. Alexander & K. Kotz, The menopause and sexual functioning: a review of the population-based studies, *Annual Rev Sex Res* 14: 64-82, 2000.
- [7] PM. Sarrel. Sexuality and menopause. *Obstet Gynecol*;75(4):265-305,1995.
- [8] MR. Soules, S. Sherman, E. Parrott, and al., Executive summary: stages of reproductive aging workshop (STRAW). *J Women's Health Gender-based Med*, vol 10 , 2001.
- [9] M. González, G. Viáfara, F. Caba, E. Molina, Sexual function, menopause and hormone replacement therapy (HRT) , *Maturitas* ,48, 411-420, 2004.

- [10] H.B. Yangin, G. AK Sozer, N. Sengun, K. Kukulcu, The relationship between depression and sexual function in menopause period, *Maturitas* 61 (2008) 233–237.
- [11] M.Loukid . Vieillesse reproducteur d'une population feminine de la ville de Marrakech (MAROC) : Approche anthropobiologique, Thèse de doctorat d'état es-sciences. 2007.
- [12] C. M. Obermeyer, M. Schulein, N. Hajji, M. Azelmat, Menopause in Morocco: symptomatology and medical management. *Maturitas*, 41 (2): 87-95, 2002.
- [13] JR. Guthrie, L. Dennerstein, JR. Taffe, et al. The menopausal transition: 9 year prospective population-based study. The Melbourne Women's Midlife Health Project. *Climacteric*, 7:375–89, 2004.
- [14] Leiblum, R. Sandra, Sexuality and the midlife woman. *Psychology of Women Quarterly* 14:495- 508, 1990.
- [15] Morokoff, J. Patricia, Sexuality in perimenopausal and postmenopausal women. *Psychology of Women Quarterly* 12:489-511, 1988.
- [16] Barbach, Lonnie, The pause: A closer look at menopause and sexuality, *Siecus Report* 21 (5): 1-5, 1993a,
- [17] Deeks, A. Amanda and Marita McCabe, Sexual function and the menopausal woman: The importance of age and partner's sexual functioning. *Journal of Sex Research* 38 (3): 219-25, 2001.
- [18] N.E. Avis, X. Zhao, C.B. Johannes, M. Ory, S. Brockwell, G.A. Greendale Correlates of sexual function among multi-ethnic middle-aged women: results from the Study of Women's Health across the Nation (SWAN), *Menopause*, 12, pp. 385–398, 2005.
- [19] R.E. Nappi, F. Veneroni, J. Baldaro Verde *et al.* Climacteric complaints, female identity, and sexual dysfunctions *J Sex Marital Ther*, 27, pp. 567–576, 2001.