

## Socio-Demographic and Reproductive Health Profile Among Egyptian Women with Uterine Fibroid

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### Abstract

**Background:** Uterine fibroid is the most common benign gynecological tumors affecting as many as 25% of women in the reproductive age.

**Aim of Study:** The aim of the current study is to assess Socio-demographic and reproductive health profile among Egyptian women with uterine fibroid.

**Subject and Methods:** A descriptive research design was adopted in this study.

**Setting:** The study was conducted in Inpatient and out-patient Gynecological Clinic at El-Manial Maternity Hospital.

**Sample:** A non-probability convenience sample of 120 women with uterine fibroid were chosen based on certain inclusion criteria.

**Tool:** Structured interviewing questionnaire sheet was used for data collection.

**Result:** The mean age of the study sample was  $41.4 \pm 5.3$ , 46.7% lived in rural areas, 45.8% had completed their secondary education, 82.5% were married, 59.2 were working and 78.3% had low income. 64.2% were obese, 88.3% reported past history of hypertension, 83.3% reported high level of lipid profile and 79.2% had family history of uterine fibroid and their mother was the main first family member suffering from this problems followed by the sister (16.8%) respectively. 65.8% had early menarche at age of <14yrs, Moreover more than half of the study sample 77.8% their gravida more than once, 70.7% their parity ranged between (1-3 times), 57.5% used oral hormonal contraceptive methods.

**Conclusion:** The study conducted that, middle menopausal age, living in rural area, marriage, low socioeconomic status, obesity, past medical history of hypertension and high lipids, Positive family history of uterine fibroid, Early age of menarch, parity, using oral hormonal contraceptive methods were the most common Socio-demographic and Reproductive health profile among Egyptian women With uterine fibroid.

**Recommendations:** Further studies should be done to predict the association between socio-demographic and repro-

ductive factors and the risk for uterine fibroid and examine it's impact on the quality of life.

**Key Words:** Profile – Uterine fibroid.

### Introduction

**UTERINE** fibroids are the common benign tumors of the female genital tract that are responsible for significant morbidity among women and may lead to many complications such as local mass effect, pressure on adjacent organs, excessive uterine bleeding, pregnancy associated complications, infertility, polycystic ovarian syndrome and repetitive abortions [1]. Worldwide, the incidence is about 60% in women under the age of 45 and 30% of the cases are symptomatic.

Uterine fibroids are the most common benign tumors in women of childbearing age. Fibroids are made of muscle cells and other tissues that grow in and around the wall of the uterus. Fibroids can vary in size and number and may be accompanied by infertility, miscarriage, And early onset of labor [2]. Also, women with uterine fibroids are asymptomatic and it was estimated that only 20%-50% of symptomatic women may attribute their complaints to the fibroid itself.

The causes of fibroids remain unknown. There are some theories that can explain the potential causes of uterine fibroid among reproductive age women. One of these theories is the ovarian hormones, that estrogen and progesterone are hypothesized to enhance fibroid growth and women of childbearing age and are most likely to develop fibroids, but symptoms usually do not appear until a woman is between 35 and 50 years old. Even though fibroids tend to run in families, it is unclear if the condition is hereditary because no genetic patterns have been observed [3].

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Moreover the reported risk factors consistent with the hormonal hypothesis include premenopausal status, younger age at menarche [4], obesity [5], familial predisposition [6], high lipid profile [7], un-healthy eating habits such as high intake beef, other red meat, and ham can increase the chance of getting uterine fibroid in the future [8]. Also, hormonal contraceptives used increase the risk factors for Uterine fibroid [3].

Fibroids are an important public health concern, both because of the large number of women affected by it and the large number of hysterectomies undertaken to treat the symptoms it causes [2].

The nurse has a crucial role in performing careful assessment for the presence of risk factors as age, chronic disease, stress, and poor diet. The nurse can also alleviate some of the anxiety associated with diagnostic testing by offering explanation. In addition, the nurse should be familiar with the uterine fibroid problem and its impact on the quality of life the women stage of coping.

However, it is not clear the risk factors for uterine fibroid among Egyptian women that might increase their possibility for uterine fibroid as uterine fibroid is a frequent gynecological and the most important cause of hysterectomy. Little researches was conducted in Egypt to identify Socio-demographic and reproductive health profile of women with uterine fibroid so, the present study was undertaken to identify Socio-demographic and reproductive health profile of women with uterine fibroid.

#### *Significance of the study:*

Uterine fibroid is the most common benign gynecological tumor affecting as many as 25% of women in the reproductive age group, and is present in about 80% of all hysterectomy procedures [9].

Uterine fibroid has a major public health concern and have a major impact on women quality of life. In Egypt, there are scattered nursing researches that determine the prevalence and factors predispose women to uterine fibroids, this study will explore the profile of women with fibroid. Also, this study will consider a base line data among Egyptian women with uterine fibroid to help the health care providers to focus on preventive measures to be adopted by women during their reproductive age. In addition, finding of this study will contribute to nursing practice especially in relation to early detection of risk factors that might predispose to uterine fibroid as well as, providing health education for women to lessen their liability

to acquire uterine fibroid as well as promote their health through weight reduction, screening, exercise and eating a healthy diet.

#### *Aim of the study:*

The current study aimed to explore the Socio-demographic and reproductive health profile of women with uterine fibroid.

#### *Research question:*

What is the Socio-demographic and reproductive health profile of women with uterine fibroid?

### **Subjects and Methods**

*Research design:* Descriptive research design was adopted for this study to achieve the study aim.

*Setting:* The study was conducted in Inpatient Department (22,32 and 33) and Outpatient Gynecological Clinic at El-Manial Maternity Hospital which situated at Kaser Al-Aini region. It is Cairo University, affiliated hospital providing free health care to outpatient Gynecological patients, as well as inpatient Gynecological clinic. The outpatient gynecologic clinic serves about 32.000 cases (statistic department, 2015) annually with various levels of socioeconomic status. Outpatient Gynecological clinic provides services such as gynecological care and laboratory investigation, measuring weight and height, using ultrasound examination to detect diseases and care is provided by physicians, as well as professional, diploma and high qualified nurses who are responsible for giving nursing care.

#### *Sample:*

Anon-probability convenience sample of 120 gynecological women was recruited uterine according to the following inclusion criteria: Uterine fibroid diagnosed by ultrasonography, age 30-50 years, premenopausal, had hysterectomy, myomectomy, Women Who are pregnant, or doing hysterectomy due to malignant cancer were excluded from the study. The sample size was determined by using the following sample size formula:

#### *Sample:*

*Sample size is calculated by using the following formula:*

- 2
- $n = Z \times \frac{x}{2} P(1-P)$
- e2
- $CL + 95/5$
- $P = 13\%7$ .
- $E = 6\%$
- $n = 120$

*Tools:*

Data were collected by structured interviewing questionnaire after reviewing recent related literature which developed and filled by the research investigators. This tool includes data related to (a) Socio-demographic characteristics as age, educational level, occupation, duration of marriage, weight, height, and calculation of BMI, (b) Past medical history; (c) family history of uterine fibroid and (d) Reproductive health profile of the study sample.

*Tool Validity:*

Tool was submitted to a panel of three medical and nursing experts in the field of obstetrics and gynecology to test the content validity. Modification was carried out according to the panel judgment on clarity of sentences and the appropriateness of content.

*Ethical consideration:*

After taking the Primary permission from the Research Ethics Committee at Faculty of Nursing, Cairo University, An official permission was granted from authoritative personnel at El-Manial Maternity Hospital to conduct the study. The research investigator introduced herself to the women who diagnosed with uterine fibroid, met the inclusion criteria, informed them about the purpose of this study in order to obtain their written acceptance to be recruited in this study, the research investigator also emphasized that participation in the study is entirely voluntary; anonymity and confidentiality were assured through coding the data as well as, participants were informed of their right to withdraw from the study at any time. For those who accept to be participated in this study, informed written consent was obtained from each participant.

*Pilot study:*

A pilot study was conducted on a group 12 women to ensure clarity of the questions, some questions was omitted from the tool based on the results of pilot study, so the subjects excluded from the total sample. The pilot study lasted five months.

*Procedure:*

Data was collected through a period of of 18 months from 28/9/2015 to 30/3/2017, the Research investigator collect the data after the women had been fully informed and consented for participation in the study. Data was collected through structured interviewing questionnaire to collect data related to socio-demographic characteristics, obstetric profile, medical history, gynecological and family history. The research investigator met the women

at outpatient gynecological clinic where they came to follow up of their condition. For inpatient women, the research investigator met the study sample in the gynecological ward. The research investigator asked questions in simple Arabic language and recorded the answers in the questionnaire. The interview consumed about 20 minutes for each woman. Also, Anthropometric assessment was carried out after obtaining the baseline data, As the research investigator measured women height through tape measurement and weight utilizing bath scale, accuracy was obtained through balancing zero prior to obtaining each weight and then body mass index is calculated by dividing the subject weight in kilograms by the square of her height in meters ( $BMI = \text{kg/m}^2$ ). World Health organization (WHO) (2000) categorized the body mass index as the following values: A BMI less than 18.5 is under weight; A BMI of 18.5-24.9 is normal weight; A BMI of 25.0-29.9 is over weight; A BMI of 30.0-39.9 is obese; A BMI of 40.0 is higher or severely (or morbidly) obese. The Anthropometric assessment was consumed about 10 minutes for each woman.

*Statistical analysis:*

Collected data were coded and tabulated using personal computer. Statistical package for social science (SPSS) version 11 was used. The researcher used the descriptive as well as inferential statistics. The descriptive statistics include the arithmetic mean as an average, describing central tendency of observation of each variable studied; the standard deviation as a measure of dispersion of results around the mean; and the frequency distribution and percentage of observation for each variable studied were used.

**Results**

Results are presented into one main section: Description of the sample which included four sub-sections: (a) Socio-demographic characteristics; (b) Previous medical history; (c) Family history of uterine fibroid and (d) Reproductive health profile of the study sample.

*Description of the sample:**A- Socio-demographic characteristics of the study sample:*

The results indicated that the age range was 30-50 years with a mean of  $41.4 \pm 5.3$  years. 75% of the sample was distributed at the age category (41-50 years); while 25.0% of them was distributed at the age category (30-40 years); 59.2% of sample was housewives. Less than half of the study sample (45.8%) had secondary school education, and low

percentage of the sample (5%) of them can read & write. 53.3% live in urban area, 82.5% were married and the age at onset of marriage was range between 13-25 years and monthly income was reported insufficiency (78.3%), (Table 1).

Table (1): Description of Socio-demographic characteristics and personal data

Socio-demographic data	Frequency	Percent %
<i>Age (in years):</i>		
30-40 yrs.	30	25.0
41-50 yrs.	90	75.0
X ± SD		
<i>Place of residence:</i>		
Urban	54	53.3
Rural	66	46.7
<i>Educational level:</i>		
Can't, read and write	6	5
Primary	13	10.8
Preparatory	12	10.0
Secondary	55	45.8
University	34	28.4
<i>Marital status:</i>		
Single	21	17.5
Married	99	82.5
<i>Age at Marriage:</i>		
13-25 yrs.	68	68.7
26-41 yrs.	31	31.3
<i>Occupation:</i>		
Working	71	59.2
House wives	49	40.8
<i>Income:</i>		
In sufficient	94	78.3
Sufficient	26	21.7

Regarding to BMI categories of the sample, the results revealed that 7.5.% of the sample was normal weight. However, 28.3% of the sample was overweight, while 64.2% of the sample was obese, (Fig. 1).

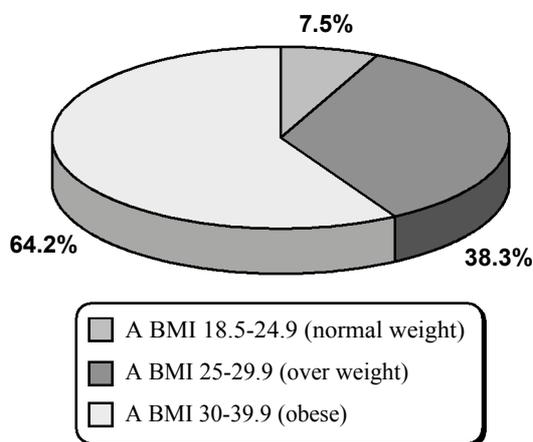


Fig. (1): Distribution of the Sample According to Category of Body Mass Index (n=120)

*B- Past history of medical disease among the study sample:*

Table (2) shows that 88.3% (n=106) of the study sample had past history of hypertension and the age of onset of hypertension occurs more than forty years with a mean age of 39.4 ± 5.3. 37.5% has a previous history of diabetes mellitus. Moreover, 83.3% reported high level of lipid profile with a mean of age at 39.2 ± 5.3 years old.

Table (2): Description of Medical history of women with uterine fibroid.

Medical history	Frequency	Percent %
<i>Hypertension:</i>		
No	14	11.7
Yes	106	88.3
<i>Age at onset of hypertension:</i>		
<40yrs	29	27.4
>=40yrs	77	72.6
X ± SD		39.4±5.3
<i>DM:</i>		
No	75	62.5
Yes	45	37.5
<i>Age at onset of DM:</i>		
<40yrs	10	22.2
>=40yrs	35	77.8
X ± SD		40.6±3.9
<i>Lipid:</i>		
No	20	16.7
Yes	100	83.3
<i>Age at onset of high lipid:</i>		
<40yrs	19	32.5
>40yrs	81	67.5
X ± SD		39.2±5.3

*C- Family history of uterine fibroid among the study sample:*

Table (3) shows that 79.2% of the study sample had family history of uterine fibroid and the mother was the main first family member suffering from this problems followed by the sister as reported by (16.8%) respectively.

Table (3): Description of Family history of women with uterine fibroid.

Family history	Frequency	Percent %
<i>FH fibroid:</i>		
No	25	20.8
Yes	95	79.2
<i>Who had fibroid:</i>		
Mother	79	83.2
Sister	16	16.8

**D- Reproductive Health profile of the study sample:**

Table (4) shows that 65.8% of the study sample (n=79) had early menarche at age of <14yrs, compared to only 0.8% of them had early menarche at age of > 17yrs, 90.0% had regular period, and 56.7% reported the duration of menstrual flow ranged from (3-5 days) with mean age 5.7 ± 1.4 years. Moreover, 60.8% between the frequency of menstrual cycle ranged from (15-27days) compared to 39.2% had a frequency ranged between (28-30) days with mean age 26.1 ± 2.4 years old.

Table (4): Description of obstetric history of women with uterine fibroid.

Obstetric history	Frequency	Percent %
<i>1-Menstrual history:</i>		
<i>Menarch age:</i>		
<14yrs	79	65.8
15-16 yrs	40	33.4
>=17yrs	1	0.8
<i>Regularity:</i>		
No	12	10
Yes	108	90
<i>Duration of menstrual flow:</i>		
3-5 days	68	56.7
6-10 days	52	43.3
X ± SD	5.7±1.4	
<i>Frequency of menstrual cycle:</i>		
15-27 days	73	60.8
28-30 days	47	39.2
X ± SD	26.1±2.4	

Moreover more than half of the study sample 77.8% (n=77) their gravida more than once, compared to only 9.1% who were nulligravida with mean age 3.2 ± 1.7, More than half of the study sample 70.7% of them their parity ranged between (1-3 times) with mean age 2. ± 61.4. The table also show that about 53.3% of the study sample had history of abortion (twice) with mean age .6 ± .6, More than half of the study sample 72.2% (n=65) their Age at 1<sup>st</sup> delivery were <25yrs while only 12.2% their Age were >30 yrs, 84.4% of the study sample their Age at last. delivery were >30 yrs, while 15.6% their Age at last. delivery were (25-30) yrs, Table (5).

Table (5): Description of Reproductive history of women with uterine fibroid.

Obstetric history	Frequency	Percent %
<i>Reproductive history:</i>		
Nulli gravida	9	9.1
Once	13	13.1
More than once	77	77.8
X ± SD	3.2±1.7	
<i>Parity:</i>		
1-3	61	70.7
>=4	29	29.3
X ± SD	2.±61.4	
<i>Abortion No:</i>		
No	37	41.1
Once	5	5.6
Twice	48	53.3
X ± SD	.6±.6	
<i>Age at 1st delivery:</i>		
<25yrs	65	72.2
25-30 yrs	14	15.6
>30yrs	11	12.2
<i>Age at last delivery:</i>		
25-30 yrs	14	15.6
>30yrs	76	84.4

Regarding to Gynecological history, Table (6) show the current types of Gynecological operation related to uterine fibroid (60.2% of the study sample had hysterectomy compared to 39.2% had Myomectomy). The table also revealed that 22.2% of the study sample had infertility.

Table (6): Description of Gynecological history among the study sample.

Gynecological history	Frequency	Percent %
<i>Myomectomy:</i>		
No	73	60.8
Yes	47	39.2
<i>Hysterectomy:</i>		
No	47	39.2
Yes	73	60.8
<i>Infertility:</i>		
No	77	77.8
Yes	22	22.2

In addition, the study sample used different types of contraceptive methods to space pregnancy. The study findings reveal that 57.5% from the study sample used oral hormonal contraceptive methods with mean age 7.8 ± 4.4, followed by 33.3% used IUD with mean age 11.2 ± 5.5 yrs and hormonal injection 9.2% with mean age 4.6 ± 1.7 yrs, Table (7).

Table (7): Description of contraceptive method used by the study sample.

Contraception history	Frequency	Percent %
<i>Contraceptive method used:</i>		
No	12	27.5
Yes	87	72.5
<i>Current type contraceptive method:</i>		
IUD	29	33.3
Mean duration of use	11.2±5.5	
Oral hormonal contraceptive	50	57.5
Mean duration of use	7.8±4.4	
Injections	8	9.2
Mean duration of use	4.6±1.7	

### Discussion

The aim of this study is to assess Socio-demographic and reproductive health profile among Egyptian women with uterine fibroid. The study results revealed that the majority of study sample their age ranged from 41-50 years, with mean of 41.4±5.3 years. This results are closely resemble with Ofori & Antwi [10] who reported that leiomyomas are common in the age groups of 41-50 years and least common in the age group of 60 years old. On the contrary, Laughlin and Schroeder [11] who found that the incidence of uterine fibroids among women who have had hysterectomies increases with age, but the rate of increase slows at older ages. This suggests that the older premenopausal uterus is less susceptible to fibroid development. This discrepancy might be due different age group as well as due to different sample size.

Regarding to BMI of the sample, the study results found that more than half of the sample were obese and less than third were over weight, These findings agreed with Wise & Laughlin-Tommaso [12] who found that higher body mass index (BMI) is associated with increase risk of fibroids. A study conducted by Dandolu & Singh [13], reported that increasing BMI was associated with fibroid risk but not with largest fibroid dimension. On the contrary, Bray & Torstenson [14] state that BMI was not associated with fibroid number or size. The inconsistency might be due to different lifestyle habits, different BMI categories as well as due to different sample size.

Moreover, the study findings revealed that more than two-Third of the study sample (83.3%)

had past history of high level of lipid profile with a mean duration of 9.2±5.3 years old. This finding was in accordance with study done by Lilyan & Shaymaa [7] who reported that patients with uterine fibroids lipid profile differs from that in women without uterine fibroids. Women with uterine fibroid have lower atherogenic index as compared to women without uterine fibroid. Larger volume of fibroid is associated with higher level of HDL-C. Moreover, recently, Uimari & Auvinen [15] reported that a higher fibroid risk in women with metabolic syndrome, and with increasing low-density lipoprotein and triglyceride levels.

The findings of the current study were contradicted with the findings of the study done by Parazzini & Chiaffarino [16] who found that there is no association between hyperlipidemia and fibroids. This discrepancy might be due to this study derived their data from medical records and subject interviews, moreover, neither study contained information on HDL-C, LDL-C or the atherogenic index.

Regarding to the women past history of hypertension, the current study revealed that more than two-Third of the study findings had hypertension at age ≥40yrs with mean of 39.4±5.3 years. This finding was in accordance with study done by Haan & Oudman [17] who recently confirmed that there is a high prevalence of hypertension in women with fibroids and showed that this association was independent of age.

Also, findings of the current study found that only more than third of the study sample had past history of diabetes mellitus. This finding agreed with study findings done by Velez Edwards & Hartmann [18] who observed that Diabetes has inversely associated with fibroid risk, in addition Wise & Laughlin-Tommaso [12] suggested that other CVD risk factors, such as diabetes and lipid disorders, also increase the risk to develop uterine fibroids. On the contrary, study carried out by Bray & Torstenson [14] who stated that Type 2 diabetes was not associated with fibroid number or size. The lack of an association between type 2 diabetes and fibroid number and size could mean that the sample size was too small, Additionally, it is possible that the effect of diabetes on fibroids is due to exposure to specific diabetes medications, which was not evaluated in the analysis.

Regarding to family history of uterine fibroid among the study results reveal that the mother was the main first family member suffering from this problems more than two-Third followed by the

sister as reported by less than third respectively. This finding agreed with Mehine & Kaasinen [6] who mentioned that positive family history was found to increase uterine fibroid risk, This effect may, however, be at least partly due to more frequent screening in relatives of women with UFs than in the general population. It may also be attributable to the role played by genetic factors in the development of UFs, In addition El-Gharib & Elsobky [19] stated that acquired chromosomal aberrations have been suggested to contribute to the growth of fibroids.

Moreover, the study findings reveal that more than two-Third of the study sample had early menarche at age of <14 yrs. This in accordance with the study done by Kim & Sefton [20] who agreed that Menarche at an early age increases the risk of developing fibroids and is also considered a risk factor for other hormonally mediated diseases, such as endometrial and breast cancers.

In addition, the study results found that more than half of the study sample their gravida more than once with mean of  $2 \pm 61$  years old. This findings agreed with the study done by Laughlin & Schroeder [11] who confirmed that Parity has been inversely associated with a risk of fibroid development. This finding was also consistent with study by Bray & Torstenson [14] who observed that having more children was associated with single fibroids, suggesting that the hormonal effects of pregnancy may reduce the number of fibroids present.

Moreover, the study findings reveals that more than half of the study sample used oral hormonal contraceptive pills with a mean duration of  $7.8 \pm 4.4$  years, this findings agreed with Khalil & Hakeem [3] who stated that hormonal contraceptives used increase the risk factors for fibroid, on the contrary, these findings disagree with Wise & Palmer [8] who showed no association or a risk for oral contraceptive use before age 17,22,25 years old respectively, this controversy might be due to women taking hormonal contraceptive pills who can develop fibroid may have longer time to diagnose as the symptoms are hidden by the effect of oral contraceptive pills.

#### Conclusion:

The study finding concluded that women with uterine fibroid in the current study had the following Socio-demographic and Reproductive health profile: Their age ranged from early to middle menopause, resided in rural area, were married, were low socioeconomic status, were obese, had past

medical history of hypertension and high lipid profile, had Positive family history of uterine fibroid (mother, sister), had early age of menarch, delivered (1-3) times and used oral hormonal contraceptive pills.

#### Recommendations:

*Based on the findings of this study, the following are recommended:*

- 1- Raise awareness of the women about the impact of obesity on the incidence of uterine fibroid.
- 2- Other researches about profile of women with uterine fibroid using large sample from different regions of the country.
- 3- Further studies should be done to predict the association between socio-demographic, reproductive factors and the risk for uterine fibroid and examine it's impact on the quality of life.

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## المواصفات الديموغرافية والإنجابية للنساء المصابات بالورم الليفي الرحمي

المقدمة: تعتبر الأورام الليفية الرحمية من أكثر الأورام الحميدة شيوعاً بين السيدات في سن الإنجاب وتؤدي هذه الأورام إلى مشاكل صحية قد تؤثر على صحة السيدات مثل عذارة الدورة الشهرية، آلام في البطن، العقم وكذلك حدوث أنيميا مزمنة في جميع أنحاء العالم، نسبة حدوثها حوالي ٦٠٪ في النساء ما بين سن ٣٠ و ٤٥ من الحالات وتكون بدون أعراض. كما أن تلك الأورام الليفية الرحمية قلق كبير على الصحة العامة ولها تأثير على جودة الحياة في مصر.

الهدف: تهدف هذه الدراسة إلى تحديد المواصفات الديموغرافية والإنجابية للنساء المصابات بالورم الليفي الرحمي.

المواد وطرق الدراسة: أجريت الدراسة في العيادات الخارجية لأمراض النساء والأقسام الداخلية أمراض النساء (قسم ٢٢، ٣٢، ٣٣) وذلك في مستشفى المنيل للأومومة والتي تقع في منطقة القصر العيني بالقاهرة وكان حجم العينة ١٢٠ تم تعيينهن وفقاً للمعايير التالية: السيدات التي لديهن ورم ليفي رحمي وتم تشخيصه بواسطة موجات فوق صوتية، السن ما بين ٣٠-٥٠ سنة، سن ما قبل أنقطاع الطمث، السيدات التي أجريت لهن إستئصال الرحم وإستئصال الورم الليفي الرحمي. أما بالنسبة للنساء الحوامل أو اللواتي أجريت لهن عملية إستئصال الرحم بسبب ورم خبيث تم أستبعادهن من الدراسة.

النتائج: أشارت النتائج إلى أن الفئة العمرية للسيدات التي لديهن ورم ليفي بالرحم كانت ٣٠-٥٠ سنة بمتوسط (٣.٥±١٤.٤) سنة ٧٥٪ من العينة يتراوح أعمارهن ما بين (٤١-٥٠ سنة) بينما ٢٥٪ منهم يتراوح أعمارهن ما بين (٣٠-٤٠ سنة)، ٥٩.٢٪ منهن ربات بيوت. أقل من نصف السيدات (٤٥.٨٪) حصلوا على تعليم مدرسي ثانوي، ونسبة منخفضة منهن (٥٪) يمكنهم القراءة والكتابة. ٥٣.٣٪ يعيشون في المناطق الحضرية، ٨٢.٥٪ كانوا متزوجين وكان العمر عند بدء الزواج ما بين ١٣-٢٥ سنة والدخل الشهري كان غير كاف حوالي ٧٨.٣٪. فيما يتعلق بمؤشر كتلة الجسم للسيدات، أظهرت النتائج أن ٧.٥٪ كانوا وزنهم طبيعي، ٢٨.٣٪ منهن يعانين من زيادة الوزن، في حين ٦٤.٢٪ منهن يعانين من السمنة، ٨٨.٣٪ من السيدات لديهن تاريخ سابق لإرتفاع ضغط الدم ويحدث عند عمر أربعين عاماً بمتوسط عمر (٥.٣±٤.٣٩)، ٣٧.٥٪ لديهن تاريخ سابق لمرض السكري، علاوة على ذلك، ٨٣.٣٪ لديهن تاريخ سابق لإرتفاع مستوى دهون الدم بمتوسط عمر (٥.٣±٣٩.٢)، ٧٩.٢٪ من السيدات لديهن تاريخ عائلي للورم الليفي الرحمي وكانت الأم فرد رئيسي في الأسرة يعاني من هذه المشكلة تليها الأخت (١٦.٨٪). ٦٥.٨٪ من السيدات حدث لهن أول دورة في وقت مبكر في عمر من >١٤ سنة، بالمقارنة مع ٠.٨٪ فقط كانت أعمارهن عند حدوث أول دورة <١٧ سنة ٩٠٪ لديهم فترة منتظمة، ٥٦.٧٪ تراوح تدفق مدة الحيض من (٣-٥ أيام) بمتوسط عمر (١.٤±٥.٧). علاوة على ذلك، تراوحت نسبة ٦٠.٨٪ بين توالى الدورة الشهرية من (١٥-٢٧ يوم) مقارنة بـ ٣٩.٢٪ تراوح ترددها ما بين (٢٨-٣٠) يوماً مع متوسط عمر (٢.٤±٦٢.١). علاوة على ذلك، فإن أكثر من نصف السيدات (٧٧.٨٪) كانت عدد مرات حملهن أكثر من مرة، مقارنة بـ ٩.١٪ فقط منهن كانوا لا ينجبوا بمتوسط عمر (١.٧±٣.٢)، أكثر من نصفهن ٧٠.٧٪ تراوحت مرات الحمل ما بين (١-٣ مرات) بمتوسط عمر (٦١.٤±٢.٢) حوالي ٥٢.٣٪ منهن لديهم تاريخ للأجهاض (مرتين) بمتوسط عمر (٦.٤±٦.٠)، ٧٢.٢٪ من السيدات كانت أعمارهم في أول ولادة <٢٥ سنة في حين أن ١٢.٢٪ فقط كانت أعمارهم <٣٠ سنة، و٨٤.٢٪ منهن كانت أعمارهم عند آخر ولادة <٢٠ سنة. وفيما يتعلق بتاريخ أمراض النساء، فإن السيدات قد خضعن لعمليات أمراض النساء المتعلقة بالأورام الليفية الرحمية ٦٠.٢٪ من السيدات خضعن لعملية إستئصال الرحم بالمقارنة بـ ٣٩.٢٪ تم إستئصال الورم الليفي لهن، ٢٢.٢٪ من هؤلاء السيدات كان لديهن عقم. بالإضافة إلى ذلك إستخدمت معظم السيدات أنواعاً مختلفة من وسائل منع الحمل، وكشفت نتائج الدراسة أن ٥٧.٥٪ منهن قمن بإستخدام وسائل منع الحمل الهرمونية عن طريق الفم مع متوسط العمر (٤.٤±٧.٨)، ٣٣.٣٪ قاموا بإستخدام اللولب بمتوسط عمر (٥.٥±١١.٢) سنة وحوالي ٩.٢٪ منهن قاموا بإستخدام حقن هرموني بمتوسط عمر (١.٧±٤.٦) سنة.

الأستنتاج: إفادت الدراسة بأن النساء اللواتي لديهن الورم الليفي الرحمي لهن الخصائص الصحية والاجتماعية والديموغرافية والإنجابية التالية: تراوحت أعمارهن من بداية سن اليأس إلى منتصفه، ويقمن في المناطق الريفية، متزوجين، ذات وضع اجتماعي واقتصادي منخفض، وبدينام، لديهن تاريخ طبي سابق لإرتفاع ضغط الدم وإرتفاع نسبة الدهون، لديهن تاريخ عائلي إيجابي للورم الليفي الرحمي (الأم، الأخت)، سن مبكر لأول دورة شهرية، عدد مرات الإنجاب (١-٣) مرات، وإستخدام وسائل منع الهرمونية عن طريق الفم.

التوصيات: بناءً على نتائج هذه الدراسة يمكن التوصية بما يلي:

- ١- زيادة الوعي لدى السيدات بشأن تأثير السمنة على حدوث الورم الليفي الرحمي.
- ٢- القيام بعمل أبحاث أخرى عن السيدات اللاتي يعانوا من الورم الليفي الرحمي بإستخدام عينة كبيرة في مناطق مختلفة من البلاد.
- ٣- إجراء مزيد من الدراسات لتبؤ العلاقة بين العوامل الاجتماعية والديموغرافية والإنجابية وخطر الإصابة بالورم الليفي الرحمي وتأثيرها على جودة الحياة.