Fayoum University Students Perception Regarding Reproductive Health

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Abstract

Background: Reproductive health is important component of general health it was a prerequisite for social, economic and human development.**Aim:**The aim of the present study was to assess Fayoum university student perception regarding reproductive health. **Design:** A descriptive study design was utilized.**Setting:** The study was conducted at the faculty of tourism and hotels and the faculty of Dar Aluloom at fayoum university.**Sample:** A purposive sample of (200) female students according certain criteria; female age 18-20 years and at the first academic year.**Tools of data collection:** two tools was used for data collection. A structured questionnaire sheet to assess knowledge of female regarding Reproductive health and attitude rating scale to assess attitude of female regarding Reproductive health. **Results:** The study revealed that the47% had good level of knowledge about Reproductive health, 43% had average level, and 10% had poor level of knowledge all study group had a positive attitude towards Reproductive health. there was a statistical significant difference in knowledge score between different income level, mother occupation and father education with lower score among students had enough income, and students whose mother were manual work, and their fathers were illiterate. **Conclusion**. near eighty percent of study group had knowledge about elements, aim of Rh and women rights, near half of study group had good level of knowledge about reproductive health,On the other hand there was no statistical significant difference in knowledge score between different residence, mother education, and father occupation. and total attitude about Reproductive health. **Recommendation:** develop reproductive health educational programs target to female university students, further researches to assess and investigate female barriers for utilization of Reproductive health services.

Key words: Reproductive health, Knowledge, Attitude, Perception, Fayoum university students

Introduction:

Reproductive health is defined as "A state of complete physical, mental, and social wellbeing and not merely the absence of disease or infirmity, in all matters related to the reproductive system and to its functions and process". It addresses the human sexuality and reproductive processes, functions and system at all stages of life and implies that people are able to have "a responsible, satisfying and safe sex life and that they have the capability to reproduce and the freedom to decide if, when and how often to do so ***(Chen et al., 2018).***

Reproductive health does not start out from a list of diseases or problems - sexually transmitted diseases, maternal mortality - or from a list of programes - maternal and child health, safe motherhood, family planning. Reproductive health instead must be understood in the context of relationships: fulfilment and risk; the opportunity to have a desired child ş or alternatively, to avoid unwanted or unsafe pregnancy ***(Eschen & Whittaker, 2018).***

Reproductive health contributes enormously to physical and psychosocial comfort and closeness, and to personal and social maturation, poor reproductive health is frequently associated with disease, abuse, exploitation, unwanted pregnancy, and death ***(Laxmidevi, 2018).***

Reproductive health is a crucial part of general health and a central feature of human development. It is a reflection of health during

childhood, and crucial during adolescence and adulthood, sets the stage for health beyond the reproductive years for both women and men, and affects the health of the next generation. The health of the newborn is largely a function of the mother's health and nutrition status and of her access to health care. Reproductive health is a universal concern, but is of special importance for women particularly during the reproductive years ***(Janghorban & Maharlouei, 2017).***

Operational Defination of perception

Ability to perceive, understanding or knowledge, mental grasp of qualities by means of senses or a warenes(Barati,2021)

Significance of the study:

Approximately, 14% of maternal mortality and 11% of all new births globally are in females aged 15–19 years, 95% of births in adolescents occurring in developing countries. Among the youth, for every one man infected with HIV, there are four women. 60–80% of African women infected with the virus has been through sexual intercourse. An estimated 1.3 million adolescent girls and 780,000 adolescent boys are living with the HIV virus worldwide. These negative consequences in reproductive health occur presently among young people in Africa born in social plagues of poverty, HIV/AIDS and poverty ***(Ibrahim et al., 2017)***

The maternal mortality ratio is 33 deaths/100, 000 live births. Egypt is classified as having a low epidemic level for HIV/AIDS. The Ministry of Health and Population reports a total of 2393 cases of HIV/AIDS from 1986 up to the end of August 2008 (1534 HIV infections and 859 AIDS cases), with 1059 deaths up to the end of August 2008 ***(Vyas, 2017).***

Aim of the study:

The study aims to assess Fayoum university students perception regarding reproductive health. This aim was achieved through

- Assessing female university students knowledge regarding reproductive health.
- Assessing female university students attitude regarding reproductive health.

Research question

What is the female university students knowledge regarding reproductive health?

What is the female university students attitude regarding reproductive health ?

Subjects and methods:

This study was portrayed under four main designs as following:

1- Technical design.
2- Operational design.
3- Administrative design.
4- Statistical design.

1- Technical design

The technical design include research design, The setting of the study, the subjects and the tools used for data collection.

Research design

A descriptive research design was utilized to fulfill the aim of this study

Setting

This study was conducted at The faculty of tourism and hotels and The faculty of Dar Aluloom at Fayoum university because the students of this faculties do not study any subject about reproductive health.

Subjects:

-Type of sample : purposive sample

-Sample criteria: the sample selected in the study according to certain criteria; female age 18-20 years, un married and at the first academic year

-**Samplesize :**the estimated sample size is 200 female students were included in the study during a period of October 2019 to March 2020).

Tool of data collection

Tool 1:Structured interviewing questionnaire sheet: the researcher developed questionnaire sheet after reviewing the current related literature.it was written in a simple Arabic language, it was divided into two parts and consisted of (36) questions of multiple choice type and close end questions,

The first part included assessment personal data such as age,marital status, number of family, income,mother and father education and their parents characteristics.

The second part include assessment knowledge regarding reproductive health issues such as The concept of reproductive health,elements of reproductive health and aim of reproductive health, goals of reproductive health services, factor that affect the reproductive health and rights of women in reproductive health.

❖ **Scoring system**

- The right answer was scored as a two point and the wrong answer was scored as a one point. these scores was summed and converted into a percent score

-it was classified into 3 categories :

*Good knowledge if The score80**.**

*Average knowledge if The score 70-80**.**

*Poor knowledge if The score under 70**.**

Tool 11: attitude rating scale

It was modified by the researcher and translated into Arabic language to help students understand and easy fulfill statement to assess attitude of the female regarding reproductive health issues.it contained (16) statements and was rated by the three point scale; agree, uncertain and disagree **(Aiken,L.R.(1996)**

❖ **Scoring system**

- Positive attitude if the Total attitude score was more than 60 percent

- Negative attitude if the total attitude was less than 60 percent was negative attitude

II. Operational design;

The operational design included preparatory phase, content validity, pilot study and field work.

***Preparatory phase:**

It included reviewing of related literature, and theoretical knowledge of various aspects of the study using books, articles, internet periodicals and magazine, to develop tools for data collection.

*** Validity :**

It was established by a panel of five experts in maternity and gynecological nursing specialty who reviewed the tools for clarity, relevance, comprehensiveness,applicability and according to their opinions and comments modification was done.

Pilot Study

A pilot study was carried out on 10% of total sample (20 students) to test study process and to evaluate the applicability, clarity, feasibility and efficiency of the tools,determine the time required to fill the data collection tool. And find the possible obstacles and problems that might face researcher and interfere data collection. The necessary modification was done according to the result of the pilot study. The subjects included in the pilot study were excluded from the study sample.

Field work

- The purpose of the study was explained simply to students.
- The researcher was available 2days per week: to collect data from female students
- The researcher started by introducing him self to female students, gave a clear and brief idea about the aim of the study and its expectations..
- All students who participated in the study fulfilled the inclusion criteria,were given tool 1(self administered questionnaire sheet to assess personal data and knowledge related to reproductive health issues in the break time between lecture.
- Attitude rating scale (tool 2) was given to assess students attitude regarding reproductive health issues and gave guidance to fill the questions when needed

III. Administrative design

An official approval with written letter clarifying, the purpose and the setting of the study was obtained from the director of the faculty of nursing at Ain Shams University and the directors of the faculty of nursing at Fayoum university.

Ethical consideration

- The approval for data collection from the students was obtained and the researcher clarified the aims, the objectives and expected outcomes from the study.
- The researcher tried hard to avoid injury to the research subject.
- The Subject or The researcher could stop the study if any problem occurred.
- Female students informed that they were allowed to choose to participate or not in the study and that they had the right to withdraw from the study at any time, ethics, values, culture and beliefs were respected.

IV. Statistical design

- Data collected and coded to facilitate data manipulation and double entered into Microsoft Analysis performed using the statistical package of social science **(spss)** software version 22 in windows 7.
- Simple descriptive analysis in the form of numbers and percentages of qualitative data, and arithmetic means as central tendency measurement, standard deviations as a measure of dispersion of quantitative parametric data
- Quantitative data included in the study first tested for normality by one sample kolmogorov –smirnov test in each study group then inferential statistic tests selected

-For quantitative data

- Independent samples **T TEST** was used to compare quantitative measures between two independent groups.
- One –way **ANOVA** TEST was used to compare quantitative measures between more than two independent groups of quantitative

-For qualitative data

- **Chi square** test was used to compare two of more than two qualitative groups.
- **Bivariate Pearson correlation test was used** to test the association between variables
- The **P-value <0.05** was considered as statistical significant

Results:

Table(1): illustrated that the mean age of study group was 18.7±0.92 years and mean number of family members was 5.8±1.5 individual, with 62% live in urban areas, all were singles, 75% earn enough income, 42% had mother educated to middle level, and 63% not working. For father educational level 45 % reach to university level, 44% of them work in professional jobs.

Table(2): illustrated that 47% of study group had a right answers about definition of RH, followed by more than half of the study sample had correct information about target group of RH services, and more than two third of the study sample around eighty had knowledge about elements, aim of RH, and woman rights, and way of STD prevention.30.4percentage of them had these information about RH from their mothers

Table(3): illustrated that about 63 to 98% of study group agreed about that education level, follow healthy life style, and increase awareness about reproductive health to teenage and youth will improve the awareness level. In addition, majority of them agreed about the important of antenatal care and involvement of both females and males in RH. Most of them agreed that the importance of early detection of STD and importance of nutrition, family planning service, and the bad effect of smoking addiction and circumcision on reproductive health.

Table (4): illustrated that the mean knowledge score about general items of RH was 15.7±1.6, and for nutrition 3.7±0.58, marriage score was 6.1±0.85, and mean score of 9.2±0.92 for pregnancy information, and for family planning knowledge the mean score was 2.3±0.43, with total knowledge score of 36.9±2.4. As regards mean attitude score, the mean was 44.5±4.1.

Table (5): illustrated that among study group, 47% had good level of knowledge about RH, 43% had average level, and 10% had poor

level of knowledge. As regards attitude all study group had a positive attitude towards RH.

Table (6): illustrates that there was a statistical significant difference with p-value <0.05 in Attitude score between different income level, mother occupation and father occupation with **lower** score among students had enough income, and students whose mother were manual work, and their fathers were manual work. On the other hand there was no statistical significant difference with p-value >0.05 in knowledge score between different residence, mother and father education.

Table (1): Distribution of different students' General characters among study group.

Variables (n=200)	**General characters**	
Mean ±SD (range)		
Age (years)	18.7±0.92	17-22
Number of Family member	5.8±1.5	3-10
Residence		
Rural	76	38%
Urban	124	62%
Social situation		
Single	200	100%
Married	0	0%
Income		
Enough	150	75%
Not enough	12	6%
Enough and save	38	19%
Mother educational level		
Illiterate	20	10%
Read and write	18	9%
Middle	84	42%
University	64	32%
Post graduate	14	7%
Mother occupation		
Manual work	30	15%
Professional	38	19%
Private	6	3%
Not work	126	63%
Father educational level		
Illiterate	8	4%
Read and write	6	3%
Medium	88	44%
University	90	45%
Post graduate	8	4%
Father occupation		
Manual work	66	33%
Professional	88	44%
Private	38	19%
Not work	8	4%

Table (2): Distribution of students' Knowledge about reproductive health among study group.

Knowledge about reproductive health (n=200)	Wrong		Correct	
	No.	%	No.	%
concept	106	53%	94	47%
Elements	34	17%	166	83%
Target population for service	84	42%	116	58%
Aim of RH	30	15%	170	85%
Woman rights in RH	28	14%	172	86%
Factor affect RH	62	31%	138	69%
Health hazards affect RH	42	21%	158	79%
Have information about RH	46	23%	154	77%
Way of STD prevention	36	18%	164	82%
Source of information about RH (n=46)				
Mother	14		30.4%	
Mass media and TV	6		13%	
Friends and Neighbors	6		13%	
Internet and social media	12		26%	
All	8		17.4%	

Table (3): Distribution of students' attitude about reproductive health among study group.

Attitude about reproductive health (n=200)	Frequency		
	Disagree No. (%)	Un certain No. (%)	Agree No. (%)
Q1	0(0%)	4(2%)	196(98%)
Q2	6(3%)	30(15%)	164(82%)
Q3	10(5%)	36(18%)	154(77%)
Q4	0(0%)	54(27%)	146(73%)
Q5	2(1%)	24(12%)	174(87%)
Q6	6(3%)	44(22%)	150(75%)
Q7	6(3%)	26(13%)	168(84%)
Q8	0(0%)	30(15%)	170(85%)
Q9	0(0%)	48(24%)	152(76%)
Q10	0(0%)	26(13%)	174(87%)
Q11	4(2%)	70(35%)	126(63%)
Q12	8(4%)	48(24%)	144(72%)
Q13	0(0%)	24(12%)	176(88%)
Q14	10(5%)	28(14%)	162(81%)
Q15	8(4%)	14(7%)	178(89%)
Q16	12(6%)	58(29%)	130(65%)

Table (4): Description of students' reproductive health knowledge and attitude among study group.

Variables	Mean	SD	Range
Knowledge score			
General RH	15.7	1.6	11-18
Nutrition	3.7	0.58	2-6
Marriage	6.1	0.85	4-8
Pregnancy	9.2	0.92	7-12
Family planning	2.3	0.43	2-3
Total knowledge	36.9	2.4	29-42
Attitude score			
Attitude	44.5	4.1	33-48

Table (5): Distribution of students' Knowledge and attitude about reproductive health among study group.

Variables (n=200)	Frequency No.	%
Knowledge		
Good (>80%)	94	47%
Average (70-80%)	86	43%
Poor (<70%)	20	10%
Attitude		
Negative	0	0%
Positive	200	100%

Table (6): Comparisons of students' attitude score about reproductive health in different General characters among study groups.

Variables	Attitude score (N=200) Mean	SD	Test	P-value	Sig.
Residence			**T** test		
Rural	44.3	4.2	0.32	0.7	NS
Urban	44.5	4			
Income			**F** test		
Enough	43.9	4.3			
Not enough	47.2	1.1	7.5	**0.001**	**HS**
Enough and save	46	2.5			
Mother educational level			**F** test		
Illiterate	43.9	4.5			
Read and write	43.8	6			
Middle	44.9	4.2	0.56	0.7	NS
University	44.3	3.2			
Post graduate	45.6	3.2			
Mother occupation			**F** test		
Manual work	41.2	5.9			
Professional	45.8	2.5	10.5	**<0.001**	**HS**
Private	42	3.2			
Not work	44.9	3.4			
Father educational level			**F** test		
Illiterate	42.3	5.4			
Read and write	43.3	3.4			
Middle	44.8	4.2	1.9	0.1	NS
University	44.1	3.9			
Post graduate	47	1.3			
Father occupation			**F** test		
Manual work	43.2	5.2			
Professional	45.1	3.6	3.2	**0.02**	**S**
Private	45.1	2.4			
Not work	45	2			

Discussion:

The results of the present study revealed that the mean age of study group was (18.7±0.92) years ranged from (17-22) years old. This finding agrees with ***Lyu et al., (2020)***, who studied Sexual Knowledge, Attitudes and Behaviors among Undergraduate Students in China Implications for Sex Education and reproductive health and reported that the mean age of studied group was 19.9 ± 1.46 years.

The finding of the present study indicated that most of the studied their mean score number of family members was (5.8±1.5) individual ranged from 3-10 individual. This result was supported by ***Abobaker et al., (2020)*** in their study of Knowledge of Adolescent

Female Students regarding their Reproductive Health, who reported that the average of their study family size was (2-8) individual.

As regard the studied female students knowledge related to general items of RH**,** the current study illustrated that less than half of study group had a correct answers about definition of RH, followed by more than half of them had correct information about target group of RH services, and around eighty percent of study group had knowledge about elements, aim of RH, and woman rights, and way of STD prevention with mean knowledge score about general items of RH was (15.7±1.6) where, the highest percentage of study group had good level of knowledge about RH.

The previous finding come in line with a study conducted by ***(Kyereme et al, 2014)*** in a study of Attitudes of Gatekeepers towards Adolescent Sexual and Reproductive Health in Ghana which reported that more than three-quarters of the studied subject answer correctly questions related to general RH knowledge and had good knowledge about reproductive health aspects

As regard female student altitude about reproductive health, the present study indicated that the highest percentage of female students agreed that education level, following healthy life style, and increase awareness about reproductive health to teenage and youth will improve their awareness level and, majority of them agreed about the important of antenatal care and involvement of both females and males in RH. Most of them agreed that the importance of early detection of STD and importance of nutrition, family planning service, and the bad effect of smoking addiction and circumcision on reproductive health indicating a good attitude toward reproductive health with total mean of (44.5±4.1) and all students had a positive attitude towards RH. This may be related to good reproductive health knowledge level among the studied group.

These findings were also in line with***Gaferi et al., (2018)*** which assessed Knowledge, attitude and practice related to reproductive health among female adolescents concluded that the majority of them had positive attitudes regarding RH, and stressed on the importance of puberty education, personal hygiene during menstruation, usefulness of family planning methods for female RH, STD risk for the fetus, and the need for RH services to be accessible for adolescents and only 11.7% had negative attitudes.

On this ground, **Mpondo et al., (2018)**in Understanding the role played by parents, culture and the school curriculum in socializing young women on sexual health issues, found that there was a highly significant relation between adolescents total knowledge about reproductive health and their mothers' level of education. Comparing with ***Dube and Sharma, (2012)***study which reported that the relationship between knowledge score of reproductive health and parent education was not significant, this might be due to easy access to information and knowledge from many sources as media, education not just parents.

Conclusion:

Research question

What is the female university students knowledge regarding reproductive health?.

What is the female university students attitude regarding reproductive health ?

Based on the findings of the present study, it can be concluded that:

- Around eighty percent of study group had knowledge about elements, aim of RH and women rights.
- As regard attitude all study group had positive attitude towards Reproductive Health
- There was a statistical significant difference in knowledge score between different income level,mother education and father education.

Recommendations:

Based on the study finding, it was recommend the following:

- ✓ Simple booklet written in Arabic language should be developed, available for all female university students included all needed information.

- ✓ Develop reproductive health educational programs on large sample
- ✓ Further researches to assess and investigate early adult barriers for utilization of RH services

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