



SOCIO-ECONOMIC AND EDUCATION RELATED INEQUITIES IN USE OF MODERN CONTRACEPTIVE IN REGION OF PUNJAB PAKISTAN

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Abstract

Objective: To determine Socio-economic and education related inequities in use of modern contraceptive in Chiniot Region of Punjab Pakistan.

Study Design: Descriptive Cross Sectional Study.

Place and duration of study: Lahore School of Nursing, The University of Lahore from June 2022 – December 2023.

Patients and Methods: The study included 640 individuals 320 from rural area and 320 from urban population. Multistage cluster sampling technique will be used to select rural areas with same characteristics. In first stage, the rural areas of three Tehsil of district Chiniot will be purposively selected. In second stage, DKT health facility served villages and adjacent public health facility villages with same demographic characteristics will be selected and marked as a cluster. The questionnaire comprises the basic demographics information i.e. socioeconomic and education related inequities in use of modern Contraceptive in Chiniot region of Punjab Pakistan. The Descriptive statistics were applied on all parameters. The chi-square test, one sample test were applied to all the parameters for comparison of Socio economic and education related inequities and p-value ≤ 0.05 was considered significant for stratification.

Results: Result showed that education status as increased the employment and self-employed status increased. In educated population have great knowledge about family planning as compared to population who is not enough educated. The educational status is significant with the knowledge of family planning and use of modern contraceptive methods ratio is higher educated population and population having good socio economic status.

Conclusion: In our investigation, we concluded that in Chiniot Punjab region of Pakistan, there are significant disparities in the use of modern contraceptives among various population sub-groups, particularly in women living in rural area and urban area of Chiniot, both in terms of their socio-economic status and level of education.

Keywords: Rural Area, Urban Area, Family Planning, Education level, Socio-economic Status

INTRODUCTION

The use of modern contraceptives is influenced by a variety of socio-economic and educational factors, and inequities in access and utilization are prevalent across different populations and regions. Here are some key points regarding socio-economic and education-related inequities in the use of modern contraceptives. Access to modern contraceptives is often limited by financial resources. Individuals with lower incomes may struggle to afford contraceptives or lack access to healthcare facilities where contraceptives are available. As a result, there tends to be lower usage rates among economically disadvantaged populations. Education plays a significant role in contraceptive use. Higher levels of education are often associated with increased awareness about contraceptive methods, better understanding of reproductive health, and improved access to healthcare services. Therefore, individuals with lower levels of education may have limited knowledge about contraceptives and family planning, leading to lower utilization rates. (Azmat, S. and et,al (2015).

Disparities in access to healthcare services exist between urban and rural areas, as well as between different regions or countries. Rural populations often face challenges such as limited availability of healthcare facilities, lack of trained healthcare providers, and transportation barriers, which can impede access to modern contraceptives. Cultural beliefs and social norms surrounding contraception vary widely across different communities and can influence contraceptive use. In some societies, there may be stigma or taboo associated with contraception, particularly among certain religious or cultural groups, which may deter individuals from seeking or using modern contraceptives. (Azmat, S. K., and et,al(2016).

Gender inequalities can also affect contraceptive decision-making and access. In many societies, women may have limited autonomy and decision-making power regarding their reproductive health choices, including the use of contraceptives. Lack of access to contraceptives or pressure from partners or family members may further restrict women's ability to use modern contraceptives. Addressing these inequities requires comprehensive strategies that address the underlying socio-economic and cultural determinants of contraceptive use. This may involve initiatives such as: Implementing educational programs to promote reproductive health and family planning, particularly targeting marginalized communities with limited access to information. (Gayatri, M. (2023).

Expanding access to affordable and quality healthcare services, including contraceptive counseling and provision, especially in rural and underserved areas. Empowering women and promoting gender equality to ensure that women have autonomy and decision-making power over their reproductive choices. (Kriel, Y., and et,al (2023).

Addressing cultural and social barriers through community engagement and awareness campaigns that challenge stigma and misconceptions surrounding contraception. By addressing these factors comprehensively, societies can work towards reducing inequities in the use of modern contraceptives and promoting reproductive health and rights for all individuals. This study objective was to identify Socio-economic and education related inequities in use of modern contraceptive in Chiniot Region of Punjab Pakistan. No previous study is available in local or international literature.

PATIENTS AND METHODOLOGY

This was a comparative Study that conduct for a year, from June 2022 – December 2023, after receiving permission from IRB Committee of UOL. Following the permission of signed informed consent, the following data was collected from 640 Subjects. The study included 640 individuals 320 from Rural area and 320 from Urban population. Married Women of reproductive age are the study population in rural areas of district Chiniot. Study area included district Chiniot and three Tehsil (Chiniot, Lalian, and Bohwana) than health facilities was selected from each Tehsil among private health facility and public health facility in a same catchment area. Multistage cluster sampling technique was used to select rural areas with same characteristics. In first stage, the rural areas of three Tehsil of district Chiniot was purposively selected. Inclusion Criteria was Married female and child bearing age (18-49 years) female. Exclusion Criteria Were Pregnant females and Psychiatric / Mentally retorted female. The questionnaire comprises the basic demographics information i.e. socioeconomic and education related inequities in use of modern Contraceptive in Chiniot region of Punjab Pakistan. The Descriptive statistics were applied on all parameters. The chi-square test, one sample test were applied to all the parameters for comparison of Socio economic and education related inequities and p-value ≤ 0.05 was considered significant for stratification.

RESULTS

The table 01 illustrated that 18-25 years old 152 subjects were Muslim and 7 were Christian, 26-33 years old 158 were Muslim and 85 were Christian, 34-44 years 97 were Muslim and 49 were Christian and 42-49 Subjects 79 were Muslim and 13 were Christian.

The table 02 illustrated that 88 illiterate subjects were $< 40,000$ and 4 were $> 40,000$, Education level 43 were Primary and 9 were $> 40,000$. The subject 68 were middle having income $< 40,000$, 55 were middle having income $> 40,000$, 99 subjects' educational status were matriculation having income $< 40,000$ and 69 were Matriculation Educational status. The 59 subjects were intermediate having income $< 40,000$ and 32 having income $> 40,000$. The subjects 28 were Bachelor having income $< 40,000$ and 86 subjects having Bachelor were income $> 40,000$. The Bar chart 01 illustrated that education status as increased the employment and self employed status increased. The table 03 illustrated that in educated population have great knowledge about family planning as compared to population who is not enough educated. The table 04 described that the educational status is significant with the knowledge of family planning and use of modern contraceptive methods ratio is higher educated population and population having good socio economic status.

SOCIO-DEMOGRAPHIC INFORMATION

Table 01 CROSS TABULATION OF AGE AND RELIGION

AGE	RELIGION		Total
	MUSLIM	CHRISTIAN	
18-25 YEARS	152	7	159
26-33 YEARS	158	85	243
34--41 YEARS	97	49	146
42-49 YEARS	79	13	92
Total	486	154	640

TABLE.02 CROSS TABULATION OF EDUCATION STATUS AND MONTHLY INCOME

EDUCATION LEVEL	MONTHLY.INCOME.OF.FAMILY		Total
	$< 40,000$	$> 40,000$	
Illiterate	88	4	92
Primary	43	9	52
Middle	68	55	123
Matriculation	99	69	168
Intermediate	59	32	91
Bachelor	28	86	114
Total	386	255	640

Bar Chart 01

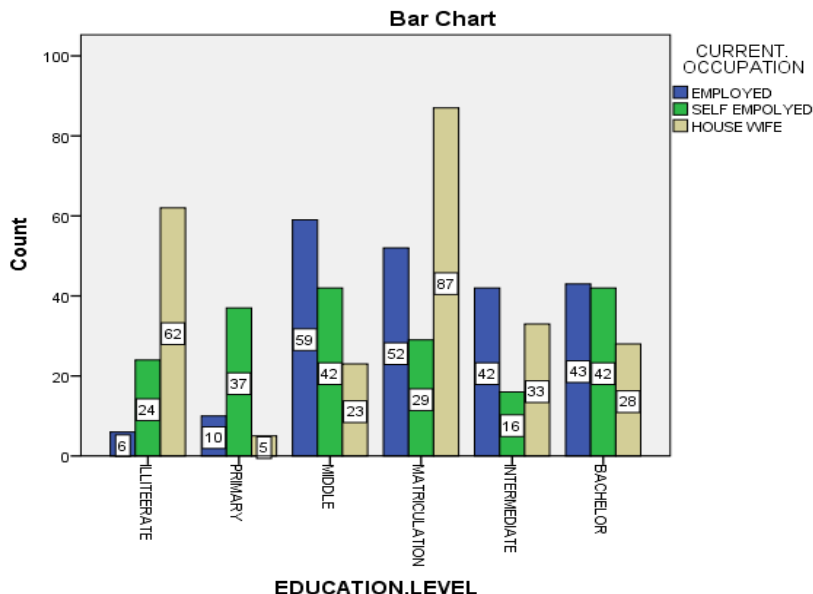


Table 03 EDUCATION LEVEL AND EDUCATION ABOUT FAMILY PLANNING

EDUCATION LEVEL	HAVE.YOU.EVER.RECIEVED.HEALTH.EDUCATION.ABOUT.FP		Total
	YES	NO	
ILLITEERATE	78	14	92
PRIMARY	52	0	52
MIDDLE	121	3	124
MATRICULATION	136	32	168
INTERMEDIATE	90	1	91
BACHELOR	102	11	113
Total	579	61	640

Table 04 Chi-Square Tests

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	90.673 ^a	15	.000
Likelihood Ratio	89.864	15	.000
Linear-by-Linear Association	19.154	1	.000
N of Valid Cases	640		

a. 6 cells (25.0%) have expected count less than 5. The minimum expected count is .24.

DISCUSSION

Socio-economic and educational inequities often play a significant role in determining access to modern contraceptives in regions like Punjab, Pakistan. Low-income households often face financial constraints that limit their access to healthcare services, including modern contraceptives. In Punjab, disparities in income distribution contribute to unequal access to contraceptives, with poorer communities having less access compared to wealthier ones. (Beatty, K., and et.al(2023). Education is a crucial determinant of contraceptive use. Women with higher levels of education are more likely to use modern contraceptives due to increased awareness, knowledge, and decision-making power regarding their reproductive health. However, in Punjab, disparities in educational attainment exist, particularly among women, which can lead to lower contraceptive usage rates in less educated communities. Sociocultural norms and religious beliefs often influence attitudes towards contraception. In conservative societies like Punjab, traditional beliefs may discourage the

use of modern contraceptives, particularly among rural and less educated populations. Religious leaders and community elders can wield significant influence over family planning practices, further perpetuating inequities in contraceptive access. (Dana, G. P. T., and et,al (2023)

In our study 18-25 years old 152 subjects were Muslim and 7 were Christian,26-33 years old 158 were Muslim and 85 were Christian,34-44 years 97 were Muslim and 49 were Christian and 42-49 Subjects 79 were Muslim and 13 were Christian.

In our study illustrated that 88 illiterate subjects were <40,000 and 4 were > 40,000, Education level 43 were Primary and 9 were > 40,000. The subject 68 were middle having income <40,000, 55 were middle having income > 40,000, 99 subjects' educational status were matriculation having income <40,000 and 69 were Matriculation Educational status. The 59 subjects were intermediate having income<40,000 and 32 having income > 40,000. The subjects 28 were Bachelor having income <40,000 and 86 subjects having Bachelor were income > 40,000. In our study illustrated that education status as increased the employment and self employed status increased. Disparities in healthcare infrastructure and service delivery also contribute to inequities in contraceptive access. Rural areas in Punjab often lack adequate healthcare facilities and trained personnel, making it difficult for residents to access contraceptive services. Moreover, stigma surrounding reproductive health issues may deter individuals, particularly women, from seeking contraceptive care. Gender disparities in decision-making power and autonomy further exacerbate inequities in contraceptive use. In patriarchal societies like Punjab, women may have limited control over their reproductive choices, leading to underutilization of modern contraceptives and higher fertility rates. Addressing these inequities requires a multi-faceted approach involving: Promoting reproductive health education and awareness programs targeting both men and women can help dispel myths, reduce stigma, and increase acceptance of modern contraceptives. (Mulugeta, S. S., and et,al (2023).

Our study concluded that in educated population have great knowledge about family planning as compared to population who is not enough educated. Investing in healthcare infrastructure and expanding contraceptive services, particularly in rural areas, can enhance access for underserved populations. Initiatives aimed at empowering women economically and socially can help increase their agency in reproductive decision-making, leading to higher contraceptive uptake and better family planning outcomes. (Mulugeta, S. S., and et,al (2023).

Working closely with community leaders and religious figures to promote positive attitudes towards family planning and contraception can help overcome cultural barriers and increase acceptance within conservative communities. Implementing policies that prioritize equitable access to reproductive healthcare services, including contraceptives, can help address systemic inequities and promote reproductive rights for all individuals. By addressing socio-economic and education-related inequities in contraceptive access, Punjab, Pakistan, can work towards achieving better reproductive health outcomes and empowering individuals to make informed decisions about their fertility and family planning. Our study results described that the educational status is significant with the knowledge of family planning and use of modern contraceptive methods ratio is higher educated population and population having good socio economic status. (Zelege, G. T., & Zemedu, T. G. (2023).

The relationship between socioeconomic status (SES) and contraceptive use is complex and multifaceted, impacting individuals and communities worldwide. SES often determines access to healthcare services, including reproductive health services and contraceptives. Individuals from higher socioeconomic backgrounds generally have better access to healthcare facilities, family planning clinics, and qualified healthcare providers. They are more likely to afford contraceptives and have health insurance coverage that includes contraceptive services. (Wondimagegne, Y. and et,al (2023).

Education plays a crucial role in shaping attitudes towards contraception and family planning. Individuals with higher levels of education tend to have greater awareness of contraceptive methods, reproductive health, and the benefits of family planning. They are more likely to make informed

decisions about contraceptive use and have access to accurate information through formal education channels, community programs, and online resources. (Memon, Z. A., and et,al (2023).

Cost can be a significant barrier to contraceptive access, particularly for individuals with limited financial resources. Modern contraceptives such as birth control pills, intrauterine devices (IUDs), and implants can be expensive, making them less accessible to individuals from lower socioeconomic backgrounds. Even when contraceptives are available for free or at reduced costs through public health programs, other associated expenses such as transportation to healthcare facilities may still pose challenges for low-income individuals. (Dana, G. P. T., and et,al(2023).

Socioeconomic status influences employment opportunities, income levels, and economic stability, all of which impact contraceptive decision-making. Individuals with secure employment and stable incomes may feel more confident in their ability to support a family and plan pregnancies strategically. Conversely, those facing financial insecurity or unemployment may be less inclined to use contraceptives due to concerns about the financial burden of raising children.

SES intersects with health literacy and empowerment, influencing individuals' ability to navigate the healthcare system, advocate for their reproductive health needs, and access quality care. Socioeconomically disadvantaged individuals may encounter systemic barriers such as discrimination, lack of culturally competent care, and limited health literacy, which can hinder their ability to access and effectively use contraceptives. Implementing policies and programs that address underlying socioeconomic inequalities, such as poverty reduction initiatives, education and job training opportunities, and support for income-generating activities. Empowering individuals economically can increase their ability to make autonomous decisions about their reproductive health and contraceptive use. (Makumbi, F. E., and et,al (2023).

By addressing the socioeconomic determinants of contraceptive use, societies can promote reproductive autonomy, improve health outcomes, and advance social justice for all individuals, irrespective of their socioeconomic status.

CONCLUSION: In our investigation, we found that in Chiniot Punjab region of Pakistan, there are significant disparities in the use of modern contraceptives among various population sub-groups, particularly in women living in rural area and urban area of Chiniot, both in terms of their socio-economic status and level of education. Therefore, it is necessary to develop specific strategies to meet the distinct family planning requirements of these subcategories in order to achieve comprehensive family planning access for everyone.

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