

ASSESSMENT OF AWARENESS, PERCEIVED BARRIERS, AND SATISFACTION
AMONG COMMUNITY HEALTH OFFICERS REGARDING THE MANAGEMENT OF
NON-COMMUNICABLE DISEASES

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ABSTRACT

Introduction: Non-communicable diseases (NCDs) are a leading global health challenge, responsible for 71% of all deaths worldwide. Community Health Officers (CHOs) play a crucial role in managing NCDs at the community level, especially in low- and middle-income countries. This study aims to assess the awareness, perceived barriers, and satisfaction among CHOs regarding NCD management. **Methodology:** This cross-sectional study employed a correlational research design. The study population consisted of 50 CHOs working in diverse community health in Luni Block Jodhpur. Data were collected using a structured questionnaire divided into four parts: demographic data, awareness assessment, perceived barriers assessment, and satisfaction measurement. Descriptive statistics, correlation analysis, and inferential statistics such as chi-square tests were used to analyze the data using SPSS version 25.0. **Results:** The study revealed that 80% of CHOs had an adequate level of awareness regarding NCDs, with a mean awareness score of 17.20 (SD = 1.852). Perceived barriers were high among 54% of CHOs, with a mean score of 7.68 (SD = 2.142). Satisfaction levels were moderate for 60% of CHOs, with a mean score of 51.46 (SD = 10.683). A significant association was found between age and perceived barriers ($p = 0.001$). However, no significant correlations were observed between awareness and satisfaction or between perceived barriers and satisfaction. **Conclusion:** The findings indicate that while CHOs have a high level of awareness regarding NCDs, they face significant perceived barriers that impact their effectiveness. Despite these barriers, satisfaction levels are moderate, suggesting room for improvement in support and resources.

KEYWORDS: Non-communicable diseases, Community Health Officers, awareness, perceived barriers, satisfaction, NCD management, public health.

INTRODUCTION

Non-communicable diseases (NCDs) have emerged as a significant global health challenge in the 21st century. The World Health Organization (WHO) defines NCDs as diseases that are not transmissible directly from one person to another, typically characterized by long duration and generally slow progression. The four main types of NCDs are cardiovascular diseases, cancers, chronic respiratory diseases, and diabetes. According to the WHO, NCDs are responsible for 71% of all deaths globally, equivalent to 41 million deaths each year. Of these deaths, 15 million occur prematurely among people aged 30-69 years. The burden of NCDs disproportionately affects low- and middle-income countries (LMICs), where 77% of all NCD deaths occur.^[1]

Efforts to combat NCDs must prioritize the reduction of risk factors and the mitigation of disparities in healthcare access, underscoring the imperative for evidence-based interventions and policies to alleviate the burden of NCDs on individuals and societies.^[2]

A study conducted across six geographic regions of India revealed significant variations in non-communicable disease (NCD) risk factors. In the northeast region, the prevalence of current tobacco use was alarmingly high at 45.7%, and alcohol use was also significant at 22.3%. Northern India exhibited the highest proportion of adults with low levels of physical activity, with 49.6% of the population falling into this category. In contrast, South India recorded the highest prevalence rates of obesity (12.5%), raised fasting blood glucose (21.2%), and raised blood pressure (35.6%).^[3]

The rising prevalence of NCDs is driven by various factors, including demographic transitions, urbanization, globalization, and shifts in lifestyle patterns. These changes have resulted in increased exposure to risk factors such as tobacco use, physical inactivity, unhealthy diets, and harmful use of alcohol. Addressing the NCD crisis requires comprehensive strategies that encompass prevention, early detection, and effective management of these diseases.^[4]

Community Health Officers (CHOs) play a crucial role in bridging the gap between healthcare systems and communities. They facilitate health promotion, disease prevention, and early intervention initiatives, particularly in resource-constrained settings. By empowering CHOs to manage NCDs at the community level, healthcare systems can potentially improve access to care, reduce the burden on higher-level facilities, and provide more patient-centered, culturally appropriate care.^[5,6]

However, several challenges hinder the effectiveness of CHOs in NCD management. These challenges include knowledge and skills gaps, limited resources, high workload, and inadequate supportive supervision. Many CHO training programs have traditionally focused on maternal and child health, infectious diseases, and basic primary care, leaving CHOs underprepared for the complexities of NCD management. Additionally, CHOs often work in resource-constrained settings with inadequate equipment, medications, and diagnostic tools, which can compromise the quality of care provided. This study aims to assess the awareness, perceived barriers, and satisfaction among CHOs regarding the management of NCDs. By understanding these aspects, policymakers and healthcare administrators can identify systemic issues and implement targeted interventions to enhance the effectiveness of CHOs in NCD management. Addressing these challenges is essential for improving health outcomes and increasing patient satisfaction at the community level.

METHODOLOGY

Study Design: This study employs a correlational research design to examine the relationships between awareness, perceived barriers, and satisfaction among Community Health Officers (CHOs) regarding the management of non-communicable diseases (NCDs).

RESULT

Table 1: Demographic Characteristics of the Sample.

(n = 50)

Variables	Categories	Frequency (n)	Percentage (%)
Age	Less than 30 Years	31	62.0
	31 - 35 Years	15	30.0
	36 - 40 Years	2	4.0
	41 Years and above	2	4.0
Gender	Male	21	42.0
	Female	29	58.0
Education Level	GNM	26	52.0
	B.Sc. Nursing	14	28.0

Study Period: The study was conducted over a period of six months.

Data Collection Period: Data collection occurred within the study period, with a duration of three months allocated for this task.

Study Setting: The study was conducted in Luni Block Jodhpur.

Study Population: The study population consists of 50 Community Health Officers (CHOs) working in diverse community health settings.

Sampling Technique: Non-probability purposive sampling was utilized to select participants. This method allows for the selection of participants based on specific criteria relevant to the research objectives.

Data Collection Tool

The data collection tool for this study consisted of a structured questionnaire divided into four parts: Part A captured demographic data of the Community Health Officers (CHOs); Part B assessed their awareness of non-communicable diseases (NCDs), including familiarity with various types of NCDs, risk factors, preventive measures, and treatment options; Part C identified perceived barriers faced by CHOs in managing NCDs, covering aspects such as resource constraints, training adequacy, and organizational challenges; and Part D measured satisfaction levels using a modified index of work satisfaction, evaluating the CHOs' contentment and fulfillment in their roles related to NCD management.

Data Analysis: Data were analyzed using SPSS version 25.0. Descriptive statistics were used to summarize demographic data, awareness, perceived barriers, and satisfaction levels. Correlation analysis was conducted to examine the relationships between awareness, perceived barriers, and satisfaction. Inferential statistics such as chi-square tests and ANOVA were used to determine associations between demographic factors and the key variables.

Ethical Considerations: This study involves human participants; therefore, ethical clearance was obtained from the relevant institutional review board. All participants provided informed consent, and their confidentiality was maintained throughout the study.

	M.Sc. Nursing	5	10.0
	Post B.Sc. Nursing	5	10.0
Years of Experience as CHO	1 - 3 years	48	96.0
	4 - 6 Years	1	2.0
	More than 6 years	1	2.0
Region of Work	Rural	50	100.0

Table 2: Mean and Standard Deviation of All Scores. (N = 50)

Variables	Mean	Standard Deviation (SD)
Awareness Score	17.20	1.852
Perceived Barriers Score	7.68	2.142
Satisfaction Score	51.46	10.683

Table 3: Category Distribution of Awareness, Perceived Barriers, and Satisfaction. (N = 50)

Variables	Categories	Frequency (n)	Percentage (%)
Awareness	Inadequate (0-10)	0	0.0
	Moderate (11-15)	10	20.0
	Adequate (16-20)	40	80.0
Perceived Barriers	Low (0-3)	1	2.0
	Moderate (4-7)	22	44.0
	High (8-10)	27	54.0
Satisfaction	Low (15-35)	2	4.0
	Moderate (36-55)	30	60.0
	High (56-75)	18	36.0

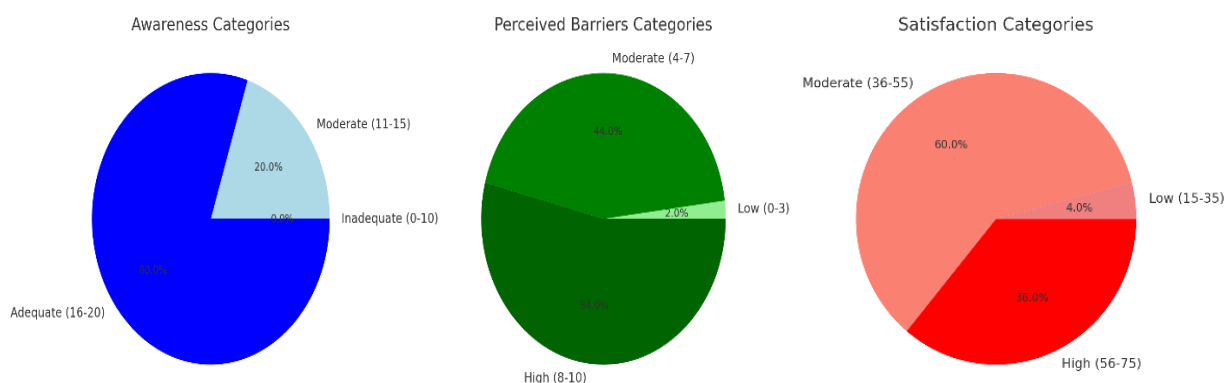


Table 4: Association between Awareness, Perceived Barriers, and Satisfaction with Selected Demographic Variables.

Variables	Chi-square (p-value)		
	Awareness	Perceived Barriers	Satisfaction
Age	2.070 (0.558)	33.518 (0.001)*	1.981 (0.921)
Gender	0.739 (0.390)	0.801 (0.670)	0.146 (0.930)
Education Level	2.850 (0.415)	1.199 (0.977)	11.079 (0.086)
Years of Experience as CHO	4.297 (0.117)	2.127 (0.712)	2.454 (0.653)

*Significant at p < 0.05

DISCUSSION

This study aimed to assess awareness, perceived barriers, and satisfaction among community health officers (CHOs) regarding the management of non-communicable diseases (NCDs) in their communities. Our results indicate a high level of awareness among CHOs regarding NCDs and their management, with 80% of participants demonstrating adequate awareness (scoring 16-20 on our scale). The mean awareness score was 17.20 (SD = 1.852), indicating a generally good

understanding of NCDs among the CHOs surveyed. This finding is consistent with a study by Panda et al.^[7], which reported that 76.7% of community health workers in Odisha, India, had good knowledge about NCDs. However, our results show a higher level of awareness compared to a study by Abdel Onagbiye et al. in majority of Community Health Workers had satisfactory knowledge about NCDs. This difference might be attributed to variations in training programs, healthcare

system structures, or the specific focus on CHOs in our study.^[8]

Our study revealed that the majority of CHOs (54%) reported high perceived barriers in effectively managing NCDs, with a mean score of 7.68 (SD = 2.142) on a scale of 1-10. This finding aligns with research by Basu *et al.*^[9], who identified significant challenges faced by community health workers in NCD management in South Africa, including resource constraints, high workload, and inadequate support systems. Our findings reveal moderate levels of satisfaction among CHOs in identifying and managing NCDs, with 60% of participants falling into this category. The mean satisfaction score was 51.46 (SD = 10.683) on a scale of 15-75. This result is comparable to a study by Musinguzi *et al.*^[10] in Uganda, which found moderate job satisfaction levels among community health workers involved in NCD programs. However, our results show lower satisfaction compared to a study by Li *et al.*^[11] in China, where 78.5% of community health workers reported high job satisfaction in chronic disease management. Surprisingly, our study found no significant correlation between awareness levels, perceived barriers, and satisfaction among CHOs. This contrasts with findings from Kok *et al.*^[12] who reported in their systematic review that knowledge and competence (analogous to our awareness measure) were positively associated with motivation and job satisfaction among community health workers. The lack of correlation in our study suggests that other factors, beyond awareness and perceived barriers, may be influencing CHOs' satisfaction levels in managing NCDs. This could include factors such as community recognition, supervisory support, or personal sense of achievement, which were not directly measured in our study. Our analysis revealed no significant associations between socio-demographic variables and levels of awareness or satisfaction. This is consistent with findings from Abraham *et al.*^[13], who also reported no significant demographic influences on job satisfaction among community health workers in Ethiopia. However, the significant association we found between age and perceived barriers adds a new dimension to the existing literature and merits further exploration.

The high level of awareness among CHOs provides a strong foundation for NCD management at the community level. However, the high perceived barriers and only moderate satisfaction levels indicate areas for potential intervention. Healthcare systems could focus on addressing these barriers, particularly for younger CHOs who seem to perceive more obstacles. Additionally, further research is needed to understand the factors influencing CHO satisfaction in NCD management, given the lack of correlation with awareness and perceived barriers. Our study was limited to a sample size of 50 CHOs, which may not be fully representative of the broader CHO population. Additionally, the study was conducted in a specific geographic area, and results

may not be generalizable to other regions or countries with different healthcare systems and NCD burdens.

In conclusion, while our findings largely support the existing body of knowledge on CHOs' roles in NCD management, they also highlight some unique aspects that contribute to the evolving understanding of this field. Further research is needed to explore the age-related influences on perceived barriers and to investigate the factors affecting satisfaction levels among CHOs in NCD management.

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