

Evaluation of Health Care Providers' Knowledge about Health Restoration for Adults with Physical Disability in Diyala City

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ABSTRACT

Background: Adults with disabilities are three times more likely than adults without disabilities to suffer from heart disease, stroke, diabetes, or cancer. Despite the fact that physical activity can help minimize the impact of many chronic conditions, approximately half of persons with disabilities do not participate in physical activity in their spare time. Caregivers' knowledge plays an important role in such people's health rehabilitation. Therefore, this study aimed to assess health care providers' knowledge about physical activity promotion for disabled adults.

Material and Methods: A convenience sample of 47 health care providers was recruited using a non-probability sampling approach in Diyala Hospitals for a descriptive cross-sectional study. The questionnaire's dependability was established through a pilot research, and it was subsequently presented to experts for validation. The total number of items in the questionnaire for knowledge related to health restoration was 13. The data was acquired using a self-reporting method and evaluated using descriptive and inferential statistical data analysis techniques.

RESULTS: The study's findings revealed that the majority of respondents were young male caretakers. According to the study's findings, 48.9 percent of caregivers had insufficient understanding about how to promote physical exercise. There were differences in knowledge with regards health restoration and caregivers gender ($p=0.059$), years of experience ($p=0.001$), job description ($p=0.001$) and training courses ($p=0.001$).

Conclusions: The study concludes that the knowledge in terms of health restoration for disabled adults, health care providers expressed a poor level due to influencing factors such as diploma graduated and nurses specialist is significantly associated poor knowledge. The Directorate of Health needs to adopt guidelines related to the international standard in the management of disability and to rely on specializations from those who have a high level of education in caring for the disabled.

Keywords: Evaluation, Health Care Provides, Health Restoration.

INTRODUCTION

In the past, it was associated with a socially secluded group. Traditionally, "inability" was used as an alternative to "disability" to indicate legal obligations and constraints on those people's constitutional rights. Oxford dictionary classified it as two different terms in 2006 [1]. Disability is not solely a result of medical problems; it is also influenced by factors such as the environment and community [2]. Those people, on the other hand, can better control their own health if they are properly informed and led [3]. There is considerable evidence that health care providers are often uncomfortable with and have dangerous attitudes toward people with disabilities, and that a lack of information about how to deal with these patients exacerbates the situation. As a result, there is a need for health-care workers to be trained and educated on issues involving disabled people in order to enhance their health [4, 6]. It is a legal obligation for member countries that have signed the United Nations Convention on the "Rights of Persons with Disabilities" (UN 2006) to provide disabled people with the same level of health care as non-disabled people, including informed consent, awareness, self-respect, and autonomy [7]. This can only be accomplished via suitable training and the dissemination of high health-care standards for disabled people in both the public and commercial sectors [8]. Therefore, this study aimed to evaluate health care providers' knowledge about health restoration of disabled people and determine the associated demographic variables in Diyala Province/ Iraq.

MATERIAL AND METHODS

The descriptive cross-sectional research design technique entails questioning individuals of the study population with the sole purpose of describing the examined phenomena in terms of its type and degree of existence.

The study is conducted at Diyala Health Directorate Baquba General Teaching Hospital which is comprised of medical and surgical wards, dialysis unit, burns unit, intensive care unit, physiotherapy unit, outpatient clinic, consultation clinic, orthopedic unit, laboratories, blood bank and pharmacy through which health care is delivered to the population of the City of Baquba.

Study instrument: The questionnaire is one of the means to help collect data that contribute to achieving the results expected by the study, so the researcher designed this questionnaire, which aims to clarify the study objectives and significance by obtaining answers to the study's questions.

This questionnaire consists of two parts which include the following:

First one is the socio-demographic variables such as (age, gender, education level, years of experience, job description and number of training courses).

Second one deals with health care providers' knowledge towards health restoration of disabled adults; it was constructed by researchers and consists of 23-items MCQ measured on a 2-point scale such as (Correct and Incorrect).

Each component of the study questionnaire was given a level of validity based on its linguistic suitability, connection with the dimension of study variables to which it was assigned, and fit for the study population. Health care providers provided data to assess the questionnaire's reliability, and the test was given to eight caregivers from the research group who were not included in the initial sample. Cronbach's alpha was discovered to be 0.84.

In order to statistically analyze the data collected from the study sample to arrive at the results, the researcher used the SPSS ver-20. A One-way analysis of variance and independent sample t test were used to examine variations in variables based on socio-demographic characteristics. For continuous variables, descriptive data is reported as mean standard deviation, and for categorical variables, it is shown as number (percent). Statistical significance was defined as a $p < 0.05$.

RESULTS

Table 1 shows that the participants' age groups, with those aged 26-30 years old having the largest percentage (38.3%), followed by those aged 31-35 years (27.7%), and then those aged 25 and >35 years. In terms of gender, male caregivers were more prevalent (68.1 percent) than female caregivers (31.9 percent). In terms of educational attainment, one-third of participants (61.7%) were diploma graduates, compared to 36.2 percent and 2.1 percent for bachelors and postgraduates, respectively. When it came to years

of experience, health care professionals said they had less than 5 years (48.9%), compared to 5-10 and >10 years (31.9 percent and 19.1 percent). In terms of work description, it is clear that health care providers (44.7 percent) have physiotherapies, followed by medical assistants (23.4 percent), technical parties, and academic nurses (17 percent and 14.9 percent, respectively). More over half of respondents (57.4%) said they had not attended any training sessions, compared to 25.5 percent who said they had attended 1-2 sessions and more than 2 sessions (17 percent).

Number of training courses	Never	27	57.4
	1-2 Sessions	12	25.5
	>2 Sessions	8	17.0

Findings in figure (1) demonstrated that the (48.9%) of caregivers exhibited a poor knowledge related to health restoration for disabled adults as described by low average and $\pm SD = 17.28 (\pm 3.46)$

Table 1: Socio-Characteristics of Study Sample (SDVs)

SDVs	Class	n=47	%
Age/years	21-25 years old	8	17.0
	26-30 years old	18	38.3
	31-35 years old	13	27.7
	>36 years old	8	17.0
Gender	Male	32	68.1
	Female	15	31.9
Education level	Diploma	29	61.7
	Bachelors	17	36.2
	Post-graduated	1	2.1
Experience	<5 years	23	48.9
	5-10 years	15	31.9
	>10 years	9	19.1
Job title	Technical parties and support	8	17.0
	Physiotherapies	21	44.7
	Academic Nurses	7	14.9
	Medical Assistance	11	23.4

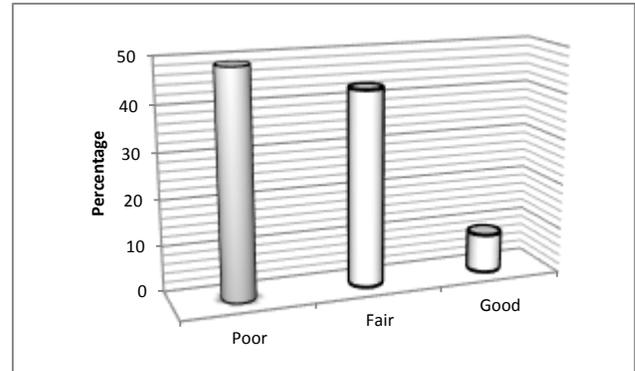


Fig 1: Caregiver Knowledge related to Health Restoration for Disabled Adults

Table 2: knowledge and Caregivers Age (n=47)

Age	Source of variance	Sum of Squares	d.f	Mean Square	F-statistic	p-value
Health Restoration Knowledge	Between Groups	.320	3	.107	1.552	.215
	Within Groups	2.955	43	.069		
	Total	3.275	46			

Findings demonstrated that there were no significant differences in caregivers knowledge towards health restoration for disability adults with regards age groups ($p > 0.05$).

Table 3: Knowledge and Caregivers Gender (n=47)

Variables	Gender	Mean	SD	t-value	d.f	p-value
Health Restoration Knowledge	Male	1.27	.176	1.937	45	.059
	Female	1.43	.383			

Findings demonstrated that there were significant differences in caregivers knowledge towards health restoration for disability adults with regards those who are male or female ($p < 0.05$).

Table 4: Knowledge and Caregivers Education Level (n=47)

Education Level	Source of variance	Sum of Squares	d.f	Mean Square	F-statistic	p-value
Health Restoration Knowledge	Between Groups	.044	2	.022	.297	.744
	Within Groups	3.231	44	.073		
	Total	3.275	46			

Findings demonstrated that there were no significant differences in caregivers knowledge towards health restoration for disability adults with regards education level ($p > 0.05$).

Table 5: Knowledge and Caregivers Years of Experience (n=47)

Years of Experience	Source of variance	Sum of Squares	d.f	Mean Square	F-statistic	p-value
Health Restoration Knowledge	Between Groups	2.179	2	1.090	43.782	.001
	Within Groups	1.095	44	.025		
	Total	3.275	46			

Findings demonstrated that there were significant differences in caregivers knowledge towards health restoration for disability adults with regards years of experience ($p < 0.05$).

Table 6: Knowledge and Caregivers Job Description (n=47)

Job Description	Source of variance	Sum of Squares	d.f	Mean Square	F-statistic	p-value
Health Restoration Knowledge	Between Groups	1.487	3	.496	11.917	.001
	Within Groups	1.788	43	.042		
	Total	3.275	46			

Findings demonstrated that there were significant differences in caregivers knowledge towards health restoration for disability adults with regards job description ($p < 0.05$).

Table 7: Knowledge and Caregivers Number of Training Courses (n=47)

Number of Training Courses	Source of variance	Sum of Squares	d.f	Mean Square	F-statistic	p-value
Health Restoration Knowledge	Between Groups	1.168	2	.584	12.191	.001
	Within Groups	2.107	44	.048		
	Total	3.275	46			

Findings demonstrated that there were significant differences in caregivers knowledge towards health restoration for disability adults with regards number of training ($p < 0.05$).

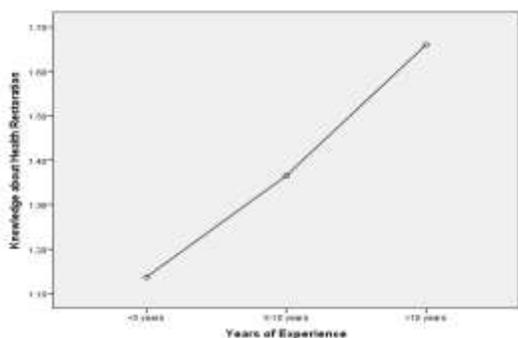


Fig 2: Distribution of Knowledge about Health Restoration on Years of Experience

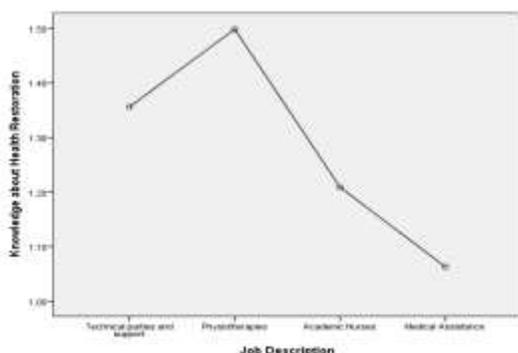


Fig 3: Distribution of Knowledge about Health Restoration on Job Description

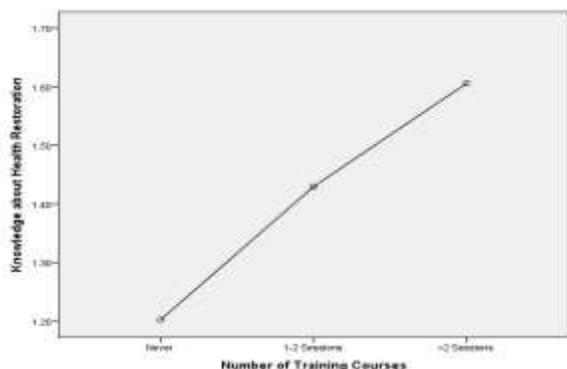


Fig 4: Distribution of Knowledge about Health Restoration on Number of Training Sessions

DISCUSSION

Adults with disabilities are three times more likely than adults without disabilities to suffer from heart disease, stroke, diabetes, or cancer. Despite the fact that physical activity can help minimize the impact of many chronic conditions, approximately half of persons with disabilities do not participate in physical activity in their spare time. Knowledge of caregivers plays a large role in the health recovery of such people. Therefore, thus aimed to assess health care providers knowledge about health restoration for disabled adults.

Advocacy groups have become increasingly interested in disability issues in recent years. However, it is unclear whether all service providers' understanding and society's attitudes regarding the health care of people with disabilities have changed. In current study, most respondent (48.9%) of caregivers exhibited a poor knowledge related to health restoration for disabled adults as described by low average and $\pm SD = 17.28 (\pm 3.46)$ (Fig 1). These

findings are worrisome in disabled care. The poor level related health restoration because influencing factors associated with knowledge limitation as caregivers gender might be play an a roles, low years of experience, lack of specialized and training staff to rehabilitate the handicapped

This finding is consistent with the findings of the World Report on Disability, which found that health care providers were ill-equipped to manage patients with disabilities and that in-service training was required for providers to stay current on disability issues and improve access to services for people with disabilities [9].

This is lower than the findings of a research conducted at the Kumasi Metropolis Hospital in Ghana, which found that 71% of respondents had poor to somewhat rehabilitative disability. Furthermore, a lack of understanding about health rehabilitation and disability-related health restoration leads to negative attitudes toward health restoration [10].

Those persons (with impairments) can, however, better control their own health provided they are properly informed and directed [11]. There is considerable evidence that health care personnel are often uncomfortable and demonstrate dangerous knowledge when interacting with people with disabilities, and that their lack of understanding in dealing with these patients exacerbates the problem [12]. As a result, there is a need for health-care workers to be trained and educated on issues involving disabled people in order to improve their health [13].

Remember, the knowledge of health care providers play an importance in restoration of health among disabled adult. The study accomplished that those poor knowledge and perception had a negative outcome on health restoration and rehabilitation services offered to disabled people if attended by these caregivers [14].

The most common factors predisposing knowledge towards health restoration for disabilities people and affects quality of care are health care providers gender, years of experience, job description and training courses were interferences with knowledge.

Health Restoration Knowledge and Caregivers Gender: The independent sample t-test confirmed that there were significant differences in caregivers knowledge towards health restoration for disability adults with regards those who are male or female ($t = 1.937$; $p < 0.059$). Differences in favor of female caregivers ($M \pm SD = 1.43 \pm 0.383$) were more well known in health restoration than male caregivers ($M \pm SD = 1.27 \pm 0.176$) (table 3). Because male carers are less engaged in dealing with disabilities, the Department of Health and decision-makers should consider comprehensive training of male caregivers in disability rehabilitation. This is corroborated by a decade of research that found a substantial link between male and female caregivers in terms of disability rehabilitation [15]. Another confirmed that female caregivers were more interested in special needs people's rehabilitation than male caregivers [16].

Health Restoration Knowledge and Caregivers Years of Experience: The analysis of variance revealed that caregivers' knowledge of health restoration for disabled persons differed significantly depending on their years of experience ($p < 0.001$) (table 5). According to the findings of this study, caregivers with more than five years of experience showed greater mean scores of knowledge than those with less experience (less than five years) (Fig.2). On the other side, more years of expertise improves caregivers' knowledge of tears health restoration in persons with disabilities. Years of expertise play an important role in the care and rehabilitation of people with disabilities and special needs in Camelo-Castillo [17]. Low years of experience and associated poor knowledge and rehabilitation of disabilities influence the knowledge of Pakistani caregivers toward people with disabilities [18].

Health Restoration Knowledge and Caregivers Job Description: There were substantial disparities in caregivers understanding of health restoration for disabled persons in terms of work description ($p = 0.001$), according to the findings (table 6). A

job title (physiotherapies) is highly connected with improved knowledge in terms of health restoration for individuals with disabilities, and medical aid nurses have a significant influence on this knowledge (Fig.6). Previously, disabled persons were cared for by nurses who were not qualified in those areas. A curriculum connected to the rehabilitation of the disabled should be spread in nursing colleges so that they may be relied upon in such ones that care for the crippled, according to decision makers. This is confirmed by studies from Pakistan, which show that with subspecialties, knowledge and attitudes about health care improve dramatically [18].

Health Restoration Knowledge and Caregivers Training Courses: The findings revealed that caregivers' understanding of health restoration for disabled persons differed significantly depending on the number of training sessions ($p=0.001$) (table 7). The differences in favor of those who have received more training, caregivers who have attended more than two sessions, are strongly associated with improved knowledge compared to those who have not (Fig.4). More years of experience and training by local officials have aided in the development of staff knowledge and increased the quality of care for people with disabilities. In order to manage and rehabilitate disabilities, the World Health Organization report and statistics proved the need of depending on specialized and trained medical professionals, as well as continual training to improve worker performance in this field.

CONCLUSION

The study concludes that the knowledge in terms of promotion of physical activity for disabled adults, health care providers expressed a poor level due to influencing such as diploma graduated and nurses specialist is significantly associated poor knowledge. The Directorate of Health needs to adopt guidelines related to the international standard in the management of disability and to rely on specializations from those who have a high level of education in caring for the disabled.

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