

# **A Descriptive study to assess the level of knowledge of home care management among renal failure patients at Pushpanjali Hospital Agra.**

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## **Abstract**

Renal failure is a chronic health condition requiring long-term management and continuous care. Effective home-care management plays a vital role in reducing complications, improving quality of life, and preventing hospital re-admissions.[1] This descriptive study was conducted at Pushpanjali Hospital, Agra, with the objective of assessing the level of knowledge among renal failure patients regarding home-care management.[2] A structured questionnaire was used to collect data. Results revealed that while a small proportion of patients had adequate knowledge, a majority demonstrated moderate to poor awareness regarding dietary management, fluid restriction, medication adherence, and infection prevention.[3] The study highlights the importance of continuous patient education and nursing intervention to improve knowledge and promote effective self-care practices.

**Keywords:** Home care management, Self-care practices, knowledge assessment, awareness, Chronic kidney disease.

## **1. Introduction**

Renal failure also known as chronic kidney disease (CKD) is a major public health issue world-wide. It is characterized by the progressive loss of kidney function, requiring either dialysis or transplantation advanced stages[4]. Home-care management forms a crucial component of renal failure treatment as it ensures adherence to therapeutic regimens and help in preventing complication. Patients with renal failure must follow strict dietary guidelines, medication regimens, fluid restrictions, and infection prevention strategies.[5] This study aimed to assess the level of knowledge regarding home-care management among renal failure patient admitted at Pushpanjali Hospital, Agra.

## OBJECTIVES

1. To evaluate the existing level of knowledge among renal failure patients about home care practices.
2. To find out association between demographic variables and patient level of knowledge.

## METHODOLOGY

- **Research design:** Descriptive research design
- **Setting:** Pushpanjali Hospital Agra
- **Population:** Patients diagnosed with renal failure
- **Research Variables: Study variable-** Chronic Renal Failure home care management
  - **Attribute Variables:** Age, Gender, Marital Status, Educational qualification, Occupation, Monthly income, Residence, Stages of CKD, Type of treatment, Duration of CKD, Family History, Type of Family and Comorbidity.
- **Sampling technique:** Convenient sampling
- **Sample Size:** The study was carried out at 50 chronic renal failure patients.
- **Tool:** A structured questionnaire named CKD-SMART was used to assess knowledge regarding diet, fluid- management, medication adherence, hygiene, and complication prevention.
- **Data collection:** Conducted through interviews and self-administered questionnaires.
- **Analysis:** Data analyzed using descriptive statistics such as frequency percentage, mean, and standard deviation.

## RESULTS

**Demographic variables:** Majority of patients were in the age group 18 above, males 56% and females 44%. **Knowledge levels:**

- **Good knowledge: 94%**
- **Moderate knowledge: 6%**
- **Poor knowledge: 0%**

### Domain wise findings:

- Highest knowledge was observed in the area of lifestyle modification.
- Least knowledge was observed in Dietary and Fluid management.

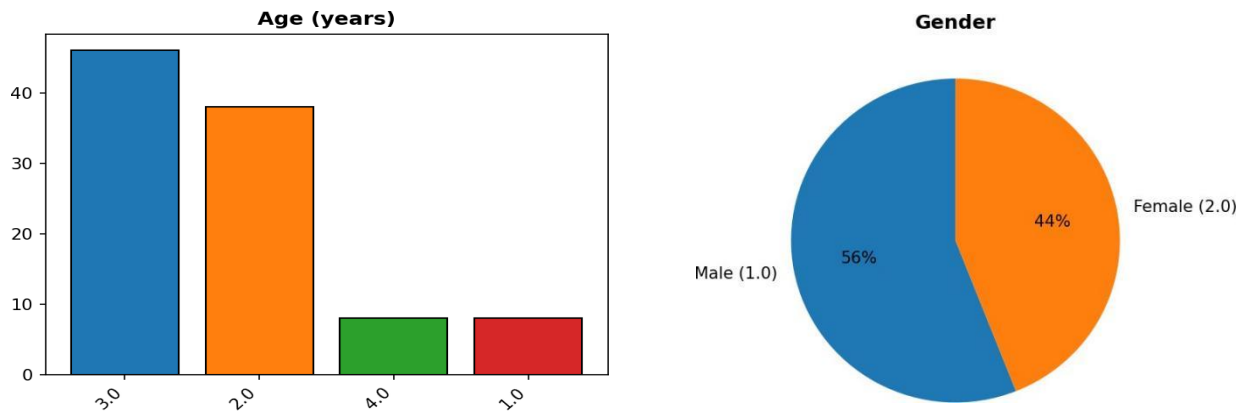


Figure no: 1 depicts that majority of renal failure patients are above 50 years and regarding gender majority of the participants were males.

**Table No: 1 Frequency and percentage distribution of subjects in terms of renal failure home care management.**

S.R No	Domain	Max Score	Mean	Mean %	Std. Deviation
1	General Knowledge	20	6.72	33.6%	1.57
2	Dietary & Fluid Management	20	6.34	31.7%	2.07
3	Medication	20	7.12	35.6%	2.42
4	Monitoring & Symptom Recognition	20	7.34	36.7%	2.26
5	Lifestyle Modification	20	7.82	39.1%	3.39

**Table No: 2 Mean, mean percentage and standard deviation of CKD knowledge and self- care management.**

### 1. Knowledge Domain Scores:

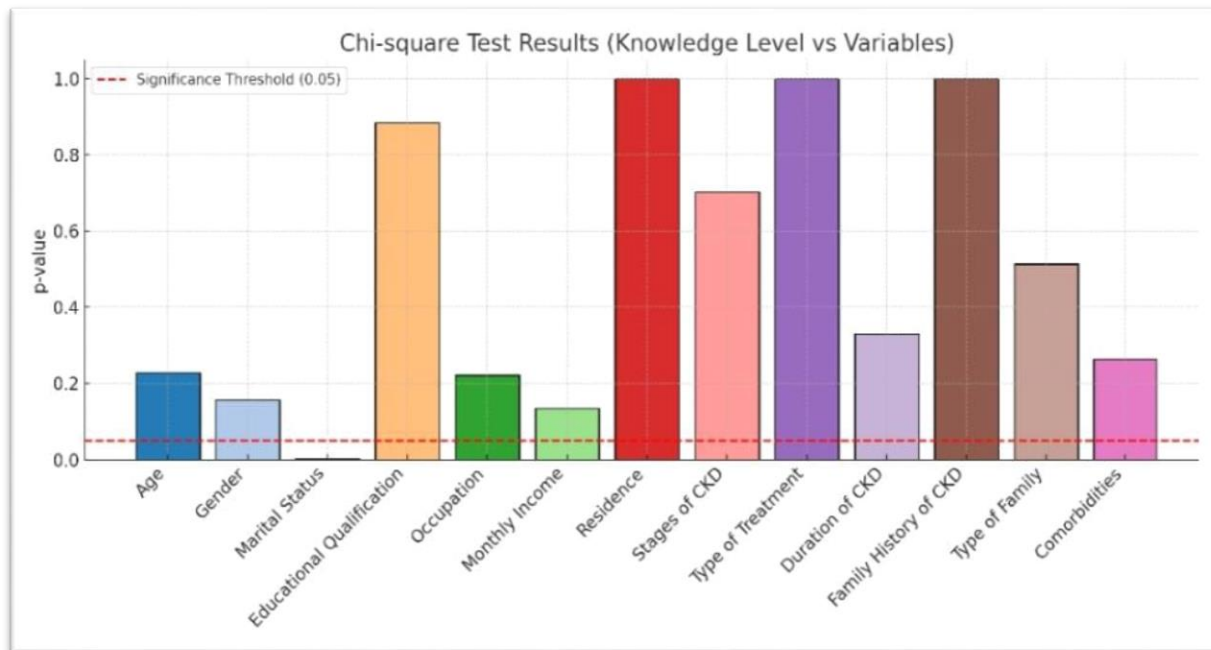
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**Table No: 3 Knowledge Level Distribution regarding home care management (N=50)**

Knowledge Level	Frequency	Percentage
Good (High)	47	94%
Moderate	3	6%
Poor (Low)	0	0%

**Table No: 4 Association of level of knowledge and demographic variables:**

Variable	p-value	Significance
Age	0.2285	NS
Gender	0.1569	NS
Marital Status	0.0025	Significant
Educational Qualification	0.8839	NS
Occupation	0.2207	NS
Monthly Income	0.1346	NS
Residence	1.0000	NS
Stages of CKD	0.7028	NS
Type of Treatment	1.0000	NS
Duration of CKD	0.3302	NS
Family History of CKD	1.0000	NS
Type of Family	0.5133	NS
Comorbidities	0.2647	NS



**Figure 2** depicts that marital status showed a statistically significant association with CKD knowledge/self-management levels ( $p = 0.0025$ ,  $p < 0.05$ ). All other variables did not show significant association ( $p > 0.05$ ). The overall analysis indicates that marital status is the only significant predictor of knowledge/self-management levels in this study.

## Discussion

The findings indicate that renal failure patients lack adequate knowledge regarding home care management. This is consistent with earlier studies with also revealed gaps in patient education. [6] Lack of awareness can lead to poor compliance, higher risk of complication, and frequent hospitalizations. Strengthening nursing education programme, periodic counselling sessions, and distribution of educational leaflets may significantly improve patient knowledge [7].

## Conclusion

The study concludes that most renal failure patients at Pushpanjali Hospital have good knowledge regarding home care management there is only guidance for a structured health education programme and regular follow ups by nursing to improve patients self-care practices and quality of life. [8]

## Recommendations

1. Develop and implement structured health education programme for renal failure patients.
2. Provide patient-friendly booklets and pamphlets on diet, fluid restriction, and lifestyle modification.
3. Conduct periodic workshops and counselling session for both patients and their caregivers.
4. Nurses should take the lead role in educating patients about home care management.

**Limitations:**

- Small sample size
- Conducted only in one hospital
- Self-reported data may have bias

**Other Sections:****Abbreviations & acronyms:**

- CKD
- OPD
- IPD
- PMNDP
- ESRD
- SPSS
- HD

**Conflict of interest**

The author declared that there is no conflict of interest regarding the conduct or publication of this study. The research was carried out purely for academic and scientific purposes, without any external financial support or commercial influence.

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**Author's Biography:**

Mrs.Aasha Maithani is serving as an Assistant Professor at Pushpanjali College of nursing, Agra. She holds extensive teaching and clinical experience in the field of medical surgical nursing. She Has guided numerous undergraduate and postgraduate nursing research projects, emphasizing evidence based practice and quality patient care. Her academic interest include renal nursing, home based care for chronic illness, patient education, and nursing research methodologies. Mrs Aasha Maithani has been actively involved in research activities, curriculum development, clinical supervision and professional training programme for nursing students she has also presented and published papers in reported journals contributing significantly to the field of nursing education and clinical practices.

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