ORIGINAL RESEARCH PAPER
Volume - 11 | Issue - 10 | October - 2022 | PRINT ISSN No. 2277 - 8179 | DOI : 10.36106/ijsr
INTERNATIONAL JOURNAL OF SCIENTIFIC RESEARCH

A DESCRIPTIVE STUDY TO ASSESS KNOWLEDGE AND ATTITUDE OF ADULTS REGARDING ORGAN DONATION IN SELECTED COMMUNITY AREAS

Nursing

Bhawna Sharma*	Department of Mental Health Nursing, Maharishi Markandeshwar College of Nursing Mullana, Ambala, Haryana, India *Corresponding Author
Ruchika Thareja	B.Sc. Nursing Students, Maharishi Markandeshwar College of Nursing Mullana, Ambala, Haryana, India
Rohit Pandita	B.Sc. Nursing Students, Maharishi Markandeshwar College of Nursing Mullana, Ambala, Haryana, India
Rahul Kumar	B.Sc. Nursing Students, Maharishi Markandeshwar College of Nursing Mullana, Ambala, Haryana, India
Rajat	B.Sc. Nursing Students, Maharishi Markandeshwar College of Nursing Mullana, Ambala, Haryana, India
Rohan Kumar	B.Sc. Nursing Students, Maharishi Markandeshwar College of Nursing Mullana, Ambala, Haryana, India
Rohan Sharma	B.Sc. Nursing Students, Maharishi Markandeshwar College of Nursing Mullana, Ambala, Haryana, India
Ruby	B.Sc. Nursing Students, Maharishi Markandeshwar College of Nursing Mullana, Ambala, Haryana, India
Sahil Kalotra	B.Sc. Nursing Students, Maharishi Markandeshwar College of Nursing Mullana, Ambala, Haryana, India
Dr. Jyoti Sarin	Director- Principal, Maharishi Markandeshwar College of Nursing Mullana, Ambala, Haryana, India

ABSTRACT

Donation of organ is an imperative component of transplantation. Every year 6000 patients expire while waiting for an organ donation. Achieving a name on the waiting list means there is still a 10-30% chance for not getting a transplant. This is due to the lack of knowledge regarding transplantation organs worldwide. Many previous studies has indicated that knowledge and attitude play a significant role in rate of organ donation. Therefore the aim of the present study is to assess knowledge and attitude of adults regarding organ donation. **Material and Methodology:** An descriptive study design was adopted to collect data from 638 persons by using snowball sampling technique. Tool used was 27 items structured knowledge questionnaire and 18 items attitude likert scale. **Result:** Result shows that majority of adult 322 (59.47%) had fair level of knowledge, 168 (26.33%) had poor level of knowledge, 139 (21.78%) had very good knowledge and 9 (1.41%) had good level of knowledge regarding organ donation. Majority of sample 478 (47.92%) had positive attitude, 140 (21.94%) had neutral and 20 (3.13%) had negative attitude of adults towards organ donation, there is positive moderate correlation between level of knowledge and attitude score. r value was 0.38 and p value was 0.001 which is highly significant.

KEYWORDS

Organ donation, Knowledge, Attitude

INTRODUCTION

Donation of organ is an imperative component of transplantation. One of the major issue contribute to the scarcity of organ is because of public attributes such as myths, religion, misconception and misunderstood decrees.[1]

Globally there were around 1.2 lakh solid organ reported to be transplanted in 2015. It was reported that there was an increase in trend of organ donation of about 5.8% since 2014. Yet, it was less<10% of the global needs decrease organ donation has an advantage of decreasing this inequity.[2]

The worldwide incidence of knowledge for organ donation varies between 60-85%. The change differs from culture and religious beliefs. Limited research has been carried out in the developing world, where the burden of end stage organ failure is on the rise and health systems are inadequately equipped.[3] Organ transplant is the most preferred treatment modality for end stage organ disease and organ failure. Many organs such as cornea, kidney and liver are commonly transplanted to human recipient.[4]

In India, 9.5 million deaths occur annually; nearly 100,000 deaths are mainly due to organ failure. Organ donation has become the only hope to save and extend the lives of people. Organ donations save lives of many patients affected by organ failures and also it helps to improve their quality of life.[5]

However the needed transplant is high and gap between organ available for transportation and the number of patient waiting for a transplant is widening globally. Similar to the developed countries a situation exist in India where there is a chronic shortage of organ for available transplantation this storage is primarily attributes to a limited number of organ donation in our country.[6]

Common transplantation of organ donation includes kidney, heart, liver, pancreas, intestines, lungs, bones, bone marrow, skin and cornea. Although some organs such as kidney and tissue like part of the pancreas, lungs, and intestines can be donated while the donor is alive, most of the donation occurs only after the donor's death.[3]

The National Organ and Tissue Transplant Programme have planned strategies to improve organ donation by creating awareness and capacity building. There is great need to assess the knowledge regarding organ donation among general population.[6]

Achieving advances in the quality and quantity of organ donation system strives to honour of donated organ by fully using those organs to save and improve the quality of lives of transplant recipient. As a result of advance achieved through basic and clinical research over the past several decades organ transplantation has become the optimal treatment for many end stage organ specific disease. However there is not enough donated organ to meet the demand.[6]

Furthermore, some organs may not be recovered, some recovered organs may not be transplanted, and some transplanted organ may not function adequately. The determination that an organ is not suitable for

transportation is based on a variety of factors, such as the health of the deceased donors, the cause of death, or functional or anatomic abnormality found in a potential donor or donor organs. To date organ transplantation research has focused almost exclusively on transplant recipient and on finding ways to improve transplantation process and post-transplant health outcome. Achieving advance in the quality and quantity of organs that can be recovered from deceased donor and successfully transplanted will require organ donor intervention research that test and assesses clinical intervention that are aimed at improving or maintaining organ quality prior, to during, and following transplantation.[7]

MATERIALS AND METHODS

A descriptive study design was adopted to collect data from 638 adults by using snowball sampling technique. Tool used was 27 items structured knowledge questionnaire and 18 items attitude likert scale. Data was collected through online mode by google forms. Google forms and registration form was prepared and link sent to participants in contact of researcher and further participants sent link of google forms to other adults in their contact. By using this method data was collected from 638 adults of states of north India including Haryana, Jammu And Kashmir, Punjab, Delhi, Uttar Pardesh and Himachal Pardesh, Chandigarh. The study included adults who are willing to participate, have age from 18-45 years, have education above 10th class, registered for data collection and excluded adults who have not filled complete data and form.

Procedure For Final Data Collection

- Data collection was done from 28th June 2020- 7th May 2020.
- Google form was used for collection of data.
- Firstly, formal administrative approval was taken from Principal of M.M. College of Nursing.
- Google form for registration was made and was given to target population to get themselves register for participation in study.
- Responses were kept open from 3pm-6pm on 28 June 2020.
- But in given time, desired sample size was not achieved, so again registrations were opened for 3 days.
- 700 participants have registered and then we had stop taking responses, samples who does not met inclusion criteria were removed.
- Then we sent our tool to respective-mail ids of the samples for data collection.
- We gave them 7days to fill the tool. After that we closed taking responses.
- Total 638 samples were taken from different states of India. i.e Himachal Pradesh, Uttar Pradesh,, Punjab, Haryana, Chandigarh, Delhi, Jammu and Kashmir.

Measures

Selected variables:

It included 12 questions which are to be filled by the respondent only. Question include-age, gender, education, occupation, nationality, marital status, religion, do you know about organ donation, Heard Anyone registered, Have you ever registered for organ donation?, proof of registration, are you health professional?

Structured knowledge questionnaire:

It is a standardized tool consisting 27 questions of knowledge. For every correct answer 1 mark will be awarded. The structured knowledge questionnaire score was categorised into four categories Very good, good, fair, and poor &18 question for attitude assessment. Reliability of the tool is assessed by KR20 formula and calculated value is 0.85

Attitude Scale:

It is a standardized tool consisting 18 statement of attitude. Each item is rated on three point likert scale. The structured knowledge questionnaire score was categorised into three categories Positive attitude, negative attitude, negative attitude. Reliability of the tool is assessed by Cronbach's alpha formula and calculated value is 0.82.

RESULTS:

The demographic data shows that among sample of 638, 224 (35.10%) belongs to the age group of 25-31years, 223 (34.95%) belongs to the age group of 18-24 years, 124(19.4%) belongs to the age group of 32-38years, 67(10.50%) belongs to the age group of 39-45 years. Majority of sample 367 (57.52%) were male and 271(42.47%) were female. Majority of the sample 366 (57.36%) lives in urban area and 272 (42.63%) lives in rural area. 393(61.59%) were graduate, 119(18.65%) were 12th pass, 104 (16.30%) were post graduate. Majority of the sample 195 (30.56%) have income in the range of Rs 15001-25000, 191 (29.93%) have income in range of Rs 5001-15000, 177 (27.74%) have income in range of Rs<5000. Around 250 (39.18%) belongs to student category under occupation section, 187 (29.31%) belongs to Private job, 65 (10.18%) are Business man, 46 (7.21%) are Health professional, 42 (6.58%) opt Govt job. Majority of the sample i.e. 592 (92.7%) are not health professionals and 46 (7.21%) are health professionals.

Majority of the sample 455 (71.31%) have not attended organ donation campaigns in India and 183 (28.63%) have attended. Around 615 (96.39%) participant's friend or family had never had need of organ acceptance and 23 (3.60%) had need of organ acceptance. Majority of the sample 330 (51.72%) know that they have to register themselves before donating any organ and 308 (48.27%) not. Majority of the sample 626 (98.11%) have registered themselves for organ donation and 12 (1.88%) not. Majority of sample 560 (87.77%) don't know anyone who has registered for organ donation, 32 (5.01%) knew friends who has registered for organ donation, 32 (5.01%) knew colleagues who has registered for organ donation, 14 (2.19%) knew family members who has registered for organ donation.

Among adults 322 (50.47%) had fair level of knowledge, 168 (26.33%) had poor level of knowledge, 139 (21.78%) had very good knowledge and 9 (1.41%) had good level of knowledge regarding organ donation and 478 (74.92%) had positive attitude, 140 (21.94%) has neutral and 20 (3.13%) had negative attitude towards organ donation.

TABLE-1

Group	Range	Mean	Mean percentage	Median	Standard deviation
Knowledge	2-27	11.1	41.1	11.0	4.63
Attitude	30-90	60.1	66.7	62.0	9.09

Knowledge minimum score- 0 maximum score- 27 **Attitude** minimum score- 18 maximum score-90

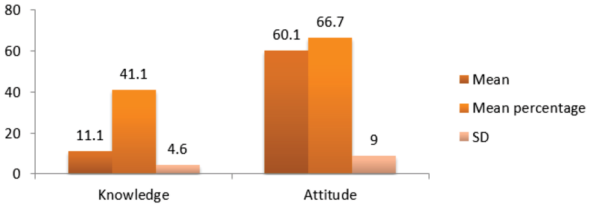

Figure- 1: Bar graph showing Mean, Mean percentage and SD of knowledge and attitude score among adults regarding organ donation

Table-2 Correlation between level of knowledge score and attitude score among adults regarding organ donation N=638

	Mean	SD	r	P value
Knowledge	11.1	4.63	0.38	0.001**
Attitude	60.1	9.09		

NS=not significant *significant (p<0.05)

Table 2 shows correlation between knowledge score and attitude score of adults regarding organ donation. It shows that there was a positive moderate correlation between level of knowledge and attitude score. r value was 0.38 and p value was 0.001 which is highly significant.

There is significant association between level of knowledge and demographic variables Age (χ^2=23.2,p value(0.006), Gender (χ^2=12.58,p value(0.006), In which area do you live? (χ^2=66.6,p value(0.001), Education (χ^2=29.3,p value(0.001), Occupation (χ^2=66.3,p value(0.001), Are you a health professional? (χ^2=173.8,p value(0.001), Marital status (χ^2=41.5,p value(0.001), Have you ever attended organ donation campaign? (χ^2=159.32,p value(0.001). There is significant association between attitude score and demographic variables In which area do you live? (χ^2=95.67,p value(0.001), Income (χ^2=27.80,p value(0.002), Education (χ^2=32.9,p value(0.001), Occupation (χ^2=81.9,p value(0.001), Are you a health professional (χ^2=272.2,p value(0.001)? Marital status (χ^2=248.4, p value(0.001)

DISCUSSION:

Present study findings revealed that half of the population have (50.47%) had fair level of knowledge, (26,33%) had poor knowledge, (21.78%) had very good knowledge regarding organ donation. The finding of the present study was supported by study done in 2017 on assessing the level of knowledge on adults regarding organ donation in Kerala. The result revealed that among adults (73%) people have above average level of knowledge and (37%) people have below average level of knowledge.[8]

Finding of the present study revealed that maximum(74.92%) of the sample have positive attitude (3.13%) of the sample have negative attitude towards organ donation.

The finding of the present study was supported by study done in 2019 on assessing the attitude of adults regarding organ donation in a study from Karachi, Pakistan. The result revealed that among the total participants 75.2% have positive attitude and 87(22%) have negative attitude toward organ donation.[9,10]

Conclusion and Recommendation:

Organ donation by living and non living donors saves lives and improves transplantation outcomes. Becoming an organ donor after death is not only an important decision for yourself, but it is also important decision for the life that you may have power to save. This study reveals that there is fair knowledge of adults of community toward organ donation and have positive towards this. The study recommended that it can be replicated on a larger sample in different settings for making broad generalizations and A comparative study can be conducted to identify the level of knowledge and attitude in rural and urban area.

REFERENCES:

1. Government of India Transplantation of human organ Act, 1994-1994 central act 42 of [cited 2007 Mar 9]. Available form http://www.medindianet/tho/thobilla.
2. 4. Shroff s. Working towards ethical organ transplants. India J Med Ethics 2007; 4:68-9 [PubMed].
3. 3. Cohen LR. Where H Hurts: Indian Material for an ethics of organ Transplantation 1999; 128: 135-65 [PubMed].
4. Asra Karim, A Survey of South Asian Attitudes to Organ Donation in the United Kingdom. National library of medicine. Sep-Oct, 2013. https://pubmed.ncbi.nlm.nih.gov/23909569/
5. Myfanwy Morgan, Ethnicity and Attitudes to Deceased Kidney Donation: A Survey in Barbados and Comparison With Black Caribbean People in the United Kingdom. National library of medicine, BMC Public Health, 2010. https://pubmed.ncbi.nlm.nih.gov/20492664/
6. Vaishaly K Bharambe, Knowledge and Attitude Toward Organ Donation Among People in Lanja: A Rural Town in India, National library of medicine. Jan- Feb, 2018. https://pubmed.ncbi.nlm.nih.gov/29456223/
7. Asra Karim, A Survey of South Asian Attitudes to Organ Donation in the United Kingdom. National library of medicine. Sep-Oct, 2013.
8. Adithyan G.S, Mariappan M, Nayana K B. A study on knowledge and attitude about organ donation among medical students in Kerala. Indian J Transplant 2017;11:133-7.
9. Adithyan G S, Mariappan M, Nayana K B. A study on knowledge and attitude about organ donation among medical students in Kerala. Indain J Transplant [serial online] 2017 [cited 2020 July 7]; 11:133-7.
10. Polit Dense and Beck Tonato Cheryl. Nursing research. Generating and assessing evidence for nursing practice.8th edition. Wolters Kluwer private Limited.2008:58-59,105-107,132,248-250,337-339,331,556-583.