Factors Affecting Interest in Transplant among End-Stage Renal Disease Patients Receiving Dialysis

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Introduction

- For patients with end-stage renal disease (ESRD) receiving dialysis, receipt of a transplant offers the best possible long-term treatment option.[1]
- The process of qualification for transplant involves many steps,[2] beginning with the patient's statement of interest.

Objectives

- To characterize transplant interest among patients of a large dialysis organization (LDO) in the US
- To explore reasons identified by patients for lack of interest in transplant

Methods

- Data on patient transplant status were derived from LDO electronic health records for active LDO patients as of 01 November 2016.
- Transplant status information is collected by LDO social workers during the course of routine care.
- Transplant categories considered were:
  - Active
  - Not interested
  - Delisted
  - Denied
  - In work-up
  - Inactive
  - On hold
  - Pending patient follow-up
- Reasons for lack of interest were assessed among patients not interested in transplant.
- Demographics and patient characteristics were compared for patients with active transplant status to those who were not interested in a transplant.

Results

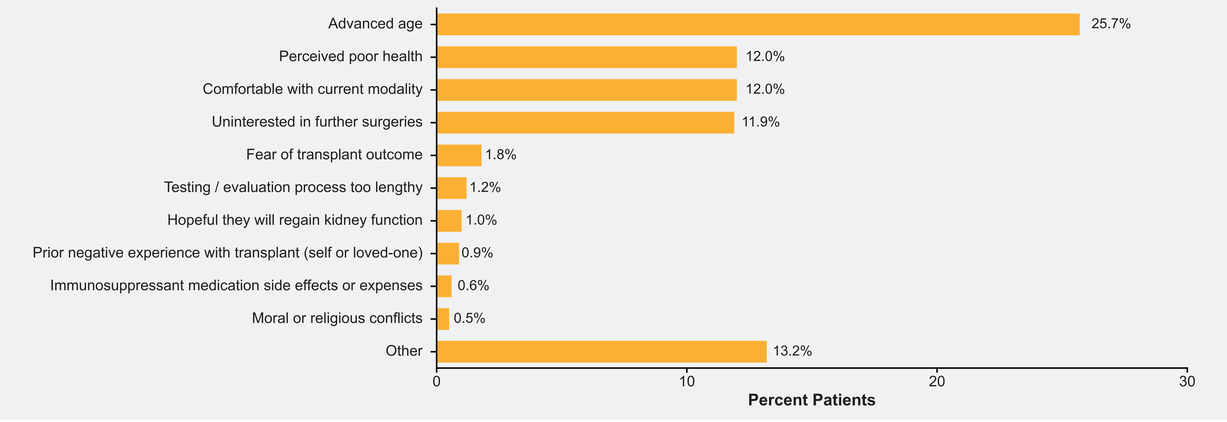
Table 1. Characteristics of Patients with Active and Not Interested Transplant Status

n (%)	Active N = 21,910	Not Interested N = 58,057
Age		
< 18	41 (0.2)	10 (0.0)
18-29	1169 (5.3)	308 (0.5)
30-39	2359 (10.8)	1094 (1.9)
40-49	4362 (19.9)	3113 (5.4)
50-59	6231(28.4)	7914 (13.6)
60-69	6016 (27.5)	14,919 (25.7)
70-79	1675 (7.6)	17,684 (30.5)
≥ 80	57 (0.3)	13,015 (22.4)
Gender		
Female	8020 (36.6)	27,721 (47.7)
Male	13,890 (63.4)	30,336 (52.3)
Race		
White	6667 (30.4)	25,488 (43.9)
Black	7784 (35.5)	19,135 (33.0)
Hispanic	4870 (22.2)	8523 (14.7)
Asian	1592 (7.3)	2448 (4.2)
Other	952 (4.3)	2260 (3.9)
Modality		
ICHD	16,153 (73.7)	53,428 (92.0)
PD	4998 (22.8)	4077 (7.0)
HHD	759 (3.5)	551 (0.9)
Insurance Type		
Medicare	15,785 (72.0)	49,581 (85.4)
Medicaid	1153 (5.3)	3401 (5.9)
Other/Unknown/None	4972 (22.7)	5075 (8.7)

Abbreviations: HHD, home hemodialysis; ICHD, in-center hemodialysis; PD, peritoneal dialysis

- As of November 2016, there were 182,906 patients with available transplant status information in the LDO database.
  - Of these, 58,057 (31.7%) expressed that they were not interested in transplant.
- Reasons for lack of interest in transplant are presented in Figure 1.
- Among patients not interested in transplant, the most frequently identified reasons for lack of interest were:
  - Advanced age (25.7%)
  - Perceived poor health (12.0%)
  - Comfortable with current modality (12.0%)
  - Uninterested in further surgeries (11.9%)
- Notably, 13.2% of patients not interested in transplant indicated that "other" factors were responsible for their lack of interest.

Figure 1. Reasons for Lack of Interest in Renal Transplant among LDO Patients



- Compared to patients with transplant status listed as active, those not interested in transplant were (Table 1):
  - Older (21.4% < 60 years vs 64.6%)
  - More likely to be female (47.7% vs 36.6%)
  - More likely to be white (43.9% vs 30.4%) and less likely to be Hispanic (14.7% vs 22.2%)
  - More likely to be receiving in-center hemodialysis (92.0% vs 73.7%)
  - More likely to have Medicare/Medicaid as primary insurance (91.3% vs 77.3%)

Conclusions

- The reasons reported by dialysis patients for lack of interest in transplant are diverse.
- Transplant education should respect the specific needs and choices of individual patients.
- Future research should:
  - Evaluate whether better education and referral to a transplant center could provide patients with greater insight into transplant as an alternative to their current modality, especially for those patients indicating they are "comfortable with current modality" or "uninterested in further surgeries"
  - Explore the reasons that make up the "other" category to further understand the factors associated with lack of interest in transplant

References

1. Tonelli, M., Wiebe, N., Knoll, G., Bello, A., Browne, S., Jadhav, D., Klarenbach, S. and Gill, J. (2011), Systematic Review: Kidney Transplantation Compared With Dialysis in Clinically Relevant Outcomes. American Journal of Transplantation, 11: 2093–2109

2. National Kidney Foundation. "Getting Ready for a Transplant" https://www.kidney.org/atoz/content/trans_getready.

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