

## 나이가 신장 이식에 미치는 영향

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### The Impact of Recipient Age in Kidney Transplantation

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**Background :** In previous reports, the acute rejection (AR) episode in elderly kidney recipients was low compared to young recipients, and it was considered that the weaker allogeneic immune response might be associated with this observation. But with the increasing need for transplantation, the age of recipient tends to be getting older. Also, the way of immunosuppression became more diverse in recent years. In this study, we try to evaluate the notion that recipient age would affect the outcome in kidney transplantation.

**Methods :** Four hundred thirty- one kidney transplants from January 2000 to December 2006 were enrolled in this study. We assessed the clinical data, serum creatinine, glomerular filtration rate (GFR), the incidence and histopathology of AR in one- year, the incidence and cause of infectious episodes in one- year, the graft and the patient survival rates in 1- , 5- year. We divided the patients into 2 groups (age <50, n=340 and age ≥50, n=91) and compared the outcomes according to age groups.

**Results :** The proportion of aged recipients was getting higher as years by. The incidences of AR and infectious episodes were not changed significantly throughout the period. The incidences of AR were 18.8% in the younger group and 24.2% in the older group (p=NS). The incidences of infectious episodes were 24.7% in the younger group and 24.2% in the older group (p=NS). The GFRs of age <49, 50 to 59, and ≥60 were  $57.07 \pm 17.683$ ,  $57.57 \pm 12.294$ ,  $53.66 \pm 19.143$ , respectively (p=NS). 1- , 5- year graft survival rates for younger recipients were 96.8, 91.8%, respectively and those for the older recipients were 94.5, 90.8%, respectively. The incidence of AR significantly correlated with the presence of diabetes mellitus, source of donor organs, and the degree of HLA matching. AR significantly affected on final GFR (p <0.001), graft survival (p<0.001) and patient survival (p=0.004).

**Conclusion :** The age of kidney recipients would not influence on the incidence of AR in recent years. Therefore, the tailored immunosuppression should be applied according to the conditions of recipients, not to the age of recipients.

**Key Words :** 신이식, 나이, 급성 거부반응  
Transplantation, Aged, Rejection