Ipsilateral or contralateral simultaneous pancreas and kidney transplantation? A comparative study with medium term outcomes

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Introduction

- During simultaneous pancreas and kidney transplantation the pancreas is usually placed in the right and the kidney in the left iliac fossa.
- Implantation of both grafts in the same side remains controversial.
- Ipsilateral transplantation could jeopardise the usually distally implanted kidney.
- This technique is quicker than the conventional contralateral implantation and preserves the other side for subsequent transplantation.

Figure1: Contralateral placement of grafts

Figure2: Ipsilateral placement of grafts

Methods

- October 2008 to October 2011 67 SPK transplantations were performed in our unit
- In 18 cases both pancreas and kidney placed in the right iliac fossa (ipsilateral graft placement)
- 49 cases pancreas placed in the right and the kidney in the left iliac fossa (contralateral graft placement)
- Patient and graft survival, surgical and non surgical complications, ITU/HDU stay and hospital stay were compared between the two groups.
- Continuous variables were compared using t-test and categorical variables using chi-square test.

Results

- There was no difference in donors and recipients demographics
- The frequency of surgical and non surgical complications was similar
- ITU/HDU and overall hospital stay were also comparable.

Donor and recipient characteristics (mean±SD)

	Ipsilateral graft placement	Contralateral graft placement
Donor age (year)	30.3 ±13.6	33.3 ±13
Donor male (%)	50	47
Donor BMI (kg/m2)	22.6 ±2.7	23.3 ±3.13
Recipient age (year)	38.6 ±9.7	43.6 ±8.51
Recipient BMI (kg/m2)	25.2 ±4.6	24.9 ±3.5
CIT (min)	796 ±143	825 ±190

Summary

- Ipsilateral placement of pancreas and kidney transplants is safe and results in similar patient and graft survival as contralateral placement of the grafts.
- The incidence of surgical and non surgical complications is also comparable.
- Ipsilateral graft placement is safe, shorter and may preserve the contralateral side for future transplants