





Figure S1. Comparison of long-term survival according to primary diagnosis for heart transplantation.

Table S1. Comparison of risk factors predicting early postoperative AKI between Taiwan National Cohort and published studies.

Author (patient number)	Wang (n = 1129)	Jokinen[14] (n = 93)	Boyle[18] (n = 756)	De Santo[42] (n = 307)	García-Gigorro[23] (<i>n</i> = 310)	Gude[24] (n = 585)	Fortrie[12] (<i>n</i> = 531)
Year/Country	2020/Taiwan	2010/Finland	2006/USA	2011/Italy	2018/Spain	2010/Norway	2016/Netherlands
Research setting	National cohort;	Single center;	Single center;	Single center;	Single center;	Single center;	Single center;
	retrospective	retrospective	retrospective	retrospective	retrospective	retrospective	retrospective
Age in years	$46 \pm 17^*$	$49 \pm 12*$	57 (50, 63)**	$32 \pm 12^*$	53**	$50 \pm 12*$	51**
Male	70%	70%	80%	67%	80%	NA	78%
Follow-up in years	5.0 ± 4.1 *	Up to 1 year	Hospital stay	Hospital stay	6.7**	6.6 ± 5.5 *	Up to 1 year
Definition of AKI	AKI-D	AKI-D	AKI-D	RIFLE-I/F (> 50% decrease in eGFR or AKI-D)	KDIGO criteria: AKI stage 1-3	AKIN (> 50% increase in sCr or AKI-D)	KDIGO criteria: AKI stage 1-3
AKI incidence	21%	25%	6%	14%	40% (AKI-D: 10.3%)	25% (AKI-D: 12%)	76% (AKI-D: 5%)
Risk factors: pre-operative	CKD AKI CAD	ARB use Pacemaker Time Intubation >24 hours eGFR < 60 ml/min/1.73 m²	High sCr Insulin-requiring DM	Previous heart operation	Logistic EuroSCORE	Pre-operative cardiac output	BMI DM CKD stage by eGFR
Risk factors: Peri- or post-operative	NA	PGD Re-admission to OR Diuresis during surgery Post-operative increase troponin T	Cardiopulmonary bypass time	Blood transfusion > 4 units Elevated Troponin I Length of ischemic time	Cardiac tamponade Acute RV failure Major bleeding	Donor age IV CsA immediately post- operatively use	RV failure
Protective factors	HBV Statin use Cardiomyopathy		Higher serum albumin				Higher age, Induction therapy
Follow-up in years	$5.0 \pm 4.1^*$	Up to 1 year	Hospital stay	Hospital stay	6.7**	6.6 ± 5.5 *	Up to 1 year
Short-term/intermediate survival impact of AKIII	In hospital $oldsymbol{\downarrow}$	NA	In hospital Ψ	In hospital ↓ 1-year ↓	In hospital ↓	3-month ↓	1-year V (only in AKI-D)
Long-term survival impact of AKI	NS for those who survived 3 months	NA	NA	NA	NS ⁺⁺	NS for those who survived 3 months	NA

^{*}Values expressed as mean ± standard deviation; **Values expressed as median (25th percentile, 75th percentile if data are available); "Compare with non-AKI cohort unless otherwise stated; the Survival after discharge compared with patients with AKI but no RRT requirement. Abbreviations: AKI, acute kidney injury; AKI-D, acute kidney injury requiring dialysis; NA, not available;

RIFLE-I/F, RIFLE (Risk, Injury, Failure, Loss, and End-stage kidney disease) criteria-Injury or Failure; eGFR, estimated glomerular filtration rate; KDIGO, Kidney Disease: Improving Global Outcomes; AKIN, the Acute Kidney Injury Network; sCr, serum creatinine; CKD, chronic kidney disease; CAD, coronary artery disease; ARB, angiotensin receptor blocker; DM, diabetes mellitus; EuroSCORE, European System of Cardiac Operative Risk Evaluation; BMI, body mass index; PGD, Prolonged graft dysfunction; OR, operating room; RV, right ventricular; IV CsA, intravenous cyclosporine; HBV, hepatitis B virus; HCV, hepatitis C virus; AKI, acute kidney injury; MMF, Mycophenolate mofetil; NS, nonsignificant.