

Policy Title:	Patient Selection Criteria for Kidney Transplantation		
Location:	GWUH	Department:	Transplant Institute
Policy Number:		Review Date:	September 26, 2020
Original Effective Date:	April 14, 2014	Current Effective Date:	September 26, 2017

- I. Scope** Transplant Institute
- II. Purpose** The purpose of this policy is to provide team members with guidelines for selecting patients for whom transplantation will provide the most optimal benefit.
- III. Definitions** A Kidney Transplant candidate is an individual with end stage kidney disease requiring dialysis or in a pre-dialysis state of health who meets the criteria of this team to be listed for a deceased donor or living donor kidney.
- IV. Policy** It is the policy of George Washington University to determine eligibility for kidney transplantation based on selection criteria that evaluates risks and benefits of the transplant procedure on an individual basis and ensures fair and nondiscriminatory decisions by the transplant team.
- V. Procedures** Patients are evaluated through the comprehensive review of medical evaluation, psychosocial assessments and testing. A multidisciplinary team of transplant professionals meets to review outcomes of these assessments and test results. Decisions to accept or exclude an individual for transplantation are based on the team's determination of the most optimal outcome and least risk for the patient. Decisions are documented in the patient's medical record.

Indications for kidney transplantation:

- A patient with Chronic Kidney Disease (CKD) who has a Glomerular Filtration Rate (GFR) less than or equal to 25 ml/min.
- Patients on dialysis
- Chronic irreversible kidney disease that has not responded to other medical or surgical treatments but the patient is not yet on dialysis
- History of adherence with healthcare recommendations
- BMI < 40
- Social support system willing to assist patient as needed in the post-operative phases of transplantation.
- Not currently smoking, using recreational drugs or abusing alcohol
- Free of active or untreated infection or malignancy
- Psychologically stable as determined by psychosocial assessments
- No severe heart disease or other blood vessel disease
- Frailty score of 0-2
- No current pharmaceutical issues that would preclude the candidate from transplant
- Have adequate insurance to cover transplant surgery, post-transplant care and medication needed after transplant

Absolute contraindications to kidney transplantation:

- Active, untreated infection
- Advanced chronic lung disease
- Advanced liver disease where the patient is not a candidate for a simultaneous liver-kidney transplant
- Advanced heart failure where the patient is not a candidate for a simultaneous heart-kidney transplant
- Uncontrolled HIV infection
- Active and unstable psychiatric illness
- Active malignancy
- Nonexistent social support system
- Active illicit substance abuse
- Active alcohol dependence
- Active psychotic symptoms that may impair adherence with transplantation
- Dementia
- History of continual non adherence with treatment
- History of recidivism of substance abuse after previous organ transplant
- Marijuana may be an absolute contraindication if the Patient Selection Committee determines that there are existing comorbidities or psychosocial concerns for a patient who tests positive for marijuana. For more details, see GW Transplant Institute's "Patient Marijuana Use" policy.
- Frailty score of 5

- Inadequate insurance to cover transplant and or medications

Relative contraindications to kidney transplantation:

- Frailty testing score of 3-4 (frail)
- Low left ventricular ejection fraction (LVEF) <35-40%
- Active nicotine abuse
- A history of multiple suicide attempts
- Marijuana may be a relative contraindication if the Patient Selection Committee determines that there is an absence of comorbidities or psychosocial concerns for a patient who tests positive for marijuana. For more details, see GW Transplant Institute’s “Patient Marijuana Use” policy.

Other potential contraindications to transplantation:

Cardiac disease

- Advanced cardiomyopathy disease, coronary artery disease (CAD)
- Peripheral vascular disease (PVD)
- Congestive heart failure (CHF) optimally managed and leaves the patient in *NYHA class III or IV
- Reduced exercise capacity (VO2 max. < 10 ml/kg/min)
- Malignant ventricular dysrhythmias refractory to treatment
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Candidates considered a high risk potential for cardiac disease (1)

- Diabetics
- History of smoking
- Prior cardiac disease
- On dialysis > 1 year
- Hyperlipidemia
- Age > 60

Nutritional problems

- Severe malnutrition or cachexia
- Morbid obesity (BMI>40)
- Severe unexplained weight loss

GI disturbances

- Active peptic ulcer disease
- Active diverticular disease
- Irreversible hepatic dysfunction
- Symptomatic cholelithiasis
- Pancreatitis

Cerebrovascular disease

- Cerebrovascular accident (CVA) with severe neurological deficit
- Severe neuropathy, or myopathy with poor prognosis for rehabilitation

Pulmonary disease

- Significant pulmonary insufficiency (FEV1<1.2 liters)
- Mild to moderate pulmonary hypertension (pulmonary artery systolic pressure >45 mmHg)
 - Testing by ECHO following dialysis to ensure a dry weight

Infections

- Hepatitis B surface antigen positive with evidence of active or severe hepatic disease
- Hepatitis C with biopsy proven histologic evidence of severe hepatic disease
- HIV viral load and CD4 <200 and non-compliance with HAART medications

Team Decision

If a patient is deferred and requires additional testing, the patient is notified in writing of the tests required to make a final decision.

- Criterion used to select each candidate is documented in the patient’s chart.
- Each patient is notified in writing of the results of the team’s decision with the date the decision was made.

- The patient's referring physician and dialysis center are also notified of the team decision.

VI. References:

1. Lentine K et al. Cardiac disease evaluation and management among kidney and liver transplantation candidates. *Circulation* 2012; 126: 617-663.
2. Collins BH. Renal Transplantation. October 2009. e-medicine. <http://emedicine.medscape.com/article/430128-overview> Accessed April 30, 2014
3. CMS Interpretive Guidelines X051 Patient and living donor selection
4. Makary MA et al. Frailty as a predictor of surgical outcomes in older patients. *Journal of the American College of Surgery* 2010; 210: 901-908.

Approved

J. Keith Melancon MD
Chief, Transplant Surgery

Date

Muralidharan Jagadeesan, MD Date
Medical Director, Kidney Transplant Institute

The George Washington University Transplant Institute

Patient Selection Meeting

Section 1: Patient Information		
Patient Name: _____	DOB: _____	Date: _____
Primary Diagnosis: _____	PRA: _____	Referring MD: _____
Section 2: Selection Criteria for Potential Transplant Recipients (select all that apply)		
Medical Indications: <input type="checkbox"/> Have a GFR less than or equal to 25 ml/min. <input type="checkbox"/> On dialysis <input type="checkbox"/> Have chronic irreversible kidney disease that hasn't responded to other treatments but is not yet on dialysis <input type="checkbox"/> Have a history of adherence with healthcare recommendations <input type="checkbox"/> Have a BMI < 40 <input type="checkbox"/> Not currently smoking, using recreational drugs or abusing alcohol <input type="checkbox"/> Free of active or untreated infection or malignancy <input type="checkbox"/> No severe heart disease or other blood vessel disease <input type="checkbox"/> Frailty Score of 0-2 <input type="checkbox"/> No current pharmaceutical issues that would preclude the candidate from transplant	Psychosocial Indications: <input type="checkbox"/> No psychiatric illness <input type="checkbox"/> Have controlled major psychotic disorder (controlled with either mental health therapy, medication management, support group) <input type="checkbox"/> Have a reliable social support system to provide support both before and after receiving transplant <input type="checkbox"/> SIPAT Score _____	Financial Indications: <input type="checkbox"/> Have adequate insurance to cover the transplant surgery, post-transplant care and medication needed after transplant
<input type="checkbox"/> Other (specify): _____		
Section 3: Absolute Contraindications (select any that apply)		TIEDI Risk Adjustment (select any that apply)
<input type="checkbox"/> Active, untreated infection <input type="checkbox"/> Advanced chronic lung disease <input type="checkbox"/> Advanced liver disease <input type="checkbox"/> Advanced heart failure <input type="checkbox"/> Uncontrolled HIV infection <input type="checkbox"/> Active and unstable psychiatric illness <input type="checkbox"/> Active malignancy <input type="checkbox"/> Frailty Score of 5 <input type="checkbox"/> History of recidivism of substance abuse after previous organ transplant <input type="checkbox"/> Other (specify): _____	<input type="checkbox"/> Inadequate social support system <input type="checkbox"/> Active illicit substance abuse <input type="checkbox"/> Active alcohol dependence <input type="checkbox"/> Active psychotic symptoms that may impair adherence with transplantation <input type="checkbox"/> Dementia <input type="checkbox"/> History of continual non-adherence with treatment <input type="checkbox"/> Inadequate insurance to cover the transplant and/or meds	<input type="checkbox"/> Previous Pancreas Islet Infusion <input type="checkbox"/> Symptomatic Peripheral Vascular Disease <input type="checkbox"/> Any previous malignancy; If selected, provide type: _____ <input type="checkbox"/> Exhausted vascular Access <input type="checkbox"/> Exhausted peritoneal Access Ethnicity: _____ Functional Status (0-100%): _____ If diabetes, age of diabetes onset: _____
Section 4: Relative Contraindications (select all that apply)		
<input type="checkbox"/> Cerebrovascular accident (CVA) <input type="checkbox"/> Severe neuropathy, or myopathy with poor prognosis for rehab <input type="checkbox"/> Significant pulmonary insufficiency <input type="checkbox"/> Active peptic ulcer disease <input type="checkbox"/> Advanced cardiomyopathy disease <input type="checkbox"/> Severe peripheral vascular disease <input type="checkbox"/> Congestive heart failure <input type="checkbox"/> Other (specify): _____	<input type="checkbox"/> Hepatitis B surface antigen positive <input type="checkbox"/> Hepatitis C with biopsy proven histologic evidence of hepatic disease <input type="checkbox"/> HIV with negative viral load and CD4>200 on HAART medications <input type="checkbox"/> Unintentional weight loss <input type="checkbox"/> Frailty Score of 3 or 4 <input type="checkbox"/> History of multiple suicide attempts <input type="checkbox"/> Low left ventricular ejection fraction	<input type="checkbox"/> Active diverticular disease <input type="checkbox"/> Irreversible hepatic dysfunction <input type="checkbox"/> Symptomatic cholelithiasis <input type="checkbox"/> Active nicotine abuse <input type="checkbox"/> Class III obesity (BMI>40) <input type="checkbox"/> Severe malnutrition or cachexia <input type="checkbox"/> Pulmonary hypertension
Section 5: Final Decision		
<input type="checkbox"/> List <input type="checkbox"/> List after review of pending test results <input type="checkbox"/> Continue to list active (e.g. for annual review) <input type="checkbox"/> Continue to list inactive (e.g. for annual review) <input type="checkbox"/> Status change (e.g. inactive to active) <input type="checkbox"/> Remove from waitlist	<input type="checkbox"/> Defer If "defer", provide the proposed follow up date: _____ Reason for deferral: <input type="checkbox"/> Additional testing needed <input type="checkbox"/> Psychosocial follow up needed <input type="checkbox"/> Other _____	<input type="checkbox"/> Deny
Section 6: Follow Up Plan		
<input type="checkbox"/> No follow up needed before listing		
Section 7: Signatures		
Name: _____	Title: Surgeon/Nephrologist	Signature: _____
Name: _____	Title: Transplant Coordinator	Signature: _____