# Human kidneys as a source of ex vivo organ transplant: Protection and repair REVISED RESEARCH PROFILE

### Background

## **Brief Description of Program**:

The aim of this study is to further increase our understanding of how modifications to organ storage solutions and methods can improve organ function and one day translate to clinical transplantation.

Program: Multi-Organ Transplant Program at London Health Sciences Centre (LHSC)

### Contact Person(s) & Contact Information:

Contact: Dr. Alp Sener 519-685-8500 ext 35011, cell: 519-630-5921

#### **Offering Information:**

TGLN-CSC will offer the kidney(s) for research to LHSC TDS who will coordinate with Dr Luke/Dr Sener when:

- 1. kidney(s) have been declined by all programs & LHSC abdominal recovery team is recovering the liver.
- 2. The research team may also use the kidney(s) for research when:
  - 1. LHSC abdominal recovery team is recovering the kidney(s) for transplant & the kidney(s) are ruled medically unsuitable.
  - Kidney(s) are deemed medically unsuitable in OR AND LHSC abdominal recovery team is recovering the liver.

#### Inclusion:

NDD, DCD, ECD, ECD/DCD kidneys acceptable.

#### **Exclusion**:

1) No consent for research.

2) Donor is HIV or Hepatitis B/C positive.

3) Donors aged <18 years of age.

## Recovery

## Method:

Recovery of organs will be as per standard protocol.

Recovery of blood will be done by the LHSC MOT Abdominal recovery team:

- (1) For NDD cases, 1 L of blood may be recovered prior to cross-clamp in the OR.
- (2) For DCD cases, 1L of blood may be recovered post flush and during venting.

LHSC MOT abdominal recovery team will bring bags, sterile transfusion line and puncture needle for collection of blood.

#### **Requirements for Perfusion**:

The grafts should be left in standard preservation solution, no additives are required. No need to send the grafts on pump, they can be shipped in cold static preservation solution.

Time Requirements: None.

Impact on Transplant/ Recovery Procedure: Procedure does not change from normal recovery procedure.

Effect on Body / Post-Mortem Care: None

Disposal of tissue: as per protocol.

**Consent Considerations:** 

Requires consent for *Scientific Research* from the donor NOK.

Recovery Personnel: Multi-Organ Transplant Program Abdominal team from LHSC.

Credentialing: As per PRC database.