

graft impaired function in kidney recipients and the development of IC in liver recipients when using DCD grafts from the same donors. Kidney graft function could be a useful tool in order to predict liver complications in the DCD transplant setting in simultaneous liver-kidney DCD donation.

#### **L\_PP#05 INFLUENCE OF BONE MARROW DERIVED MESENCHYMAL STEM CELLS ON LIVER REPERFUSION- ISCHEMIA INJURY IN A RAT MODEL – PRELIMINARY REPORT.**

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**Introduction:** During last few years total number of liver transplantations has rapidly increased. It is stated that in some cases postransplant complications are due to ischemia-reperfusion injury (IRI). IRI causes local injuries of the transplanted organ and is having an significant impact on transplantation success. **Aim:** The aim of our work was to evaluate the usefulness of bone marrow derived mesenchymal stem cells (MSCs) in limitation of liver IRI in a rat model. **Material and Methods:** In our study we have used 20 (6 week old) wistar rats. In all animals IRI was induced by use of the modification of hanging-weight system for liver ischemic preconditioning experimental technique. Then half of the animals were injected 10x 6 MSC cells through the portal vein. The bone marrow mesenchymal stem cells were derived from the femur bones and cultivated in the standard incubation conditions. We have evaluated the morphology of culture and potential differentiation level. After sacrificing the animals formation of pro- and anti-inflammatory mediators, expression of adhesion molecules, and the role of oxidant stress during the inflammatory response were evaluated. Ethical committees permission was obtained and all research procedures were carried out in accordance with the guidelines of the relevant directives of the European Union in the field of experiments on animals. **Results and Conclusion:** MSCs attenuated the inflammatory and oxidant stress response and simultaneously reduced the effect of IRI in rat liver. In future MSCs might play a crucial role in reducing the number of complications connected with liver transplantation.

#### **L\_PP#06 IS ULTRA-SHORT COLD ISCHEMIA THE KEY TO IBDL AVOIDANCE IN DCD-LT?**

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**Introduction:** DCD donors have been proposed to partially overcome the organ donor shortage. DCD-LT remains controversial, with reported increased risk of graft failure and ischemic type biliary tract lesions. The authors retrospectively reviewed a single centre experience with DCD-LT in a 9-year period. **Patients and Methods:** 70 DCD-LT were performed from 2003 to November 2012. All DCD procedures were performed in operative rooms. Mean donor age was 56 years. Most grafts were flushed with HTK solution. Allocation was centre-based. Mean total DCD warm ischemia was 20.5 min. Mean follow-up was 36 months. No patient was lost to follow-up. **Results:** Mean MELD score at LT was 15. Mean cold ischemia was 254 min. Mean peak AST was 2,330 U/L. Mean peak bilirubin was 45 mg/dL. Patient and graft survivals were 92.8% and 91.3% at one year and 79% and 77.7% at 3 years, respectively. One graft was lost due to hepatic artery thrombosis. No PNF or graft loss due to IBDL was observed in this series. **Causes of death** were malignancies in 8 cases. **Discussion:** In this series, DCD LT appears to provide results equal to classical LT. Short cold ischemia and recipient selection with low MELD score may be the keys to good results in DCD LT, in terms of graft survival and avoidance of IBDL.

#### **L\_PP#07 LIVER TRANSPLANTATION FROM DONORS AFTER CIRCULATORY DEATH - 10 YEARS EXPERIENCE**

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**Background.** Donors after circulatory death (DCD) are valuable source of organs. However, liver transplantation (LTx) using DCD livers is associated with inferior graft survival and higher rate of biliary complications. This single center, retrospective study analyzed the outcome of LTx from DCD with respect to patient and graft survival as well as biliary complications rate. Additional search was made for the risk factors for the outcome. **Material/methods.** Between November 1, 2002 and December 31, 2011 sixty-three livers out of 408 (15.7%) were transplanted from DCD. The review of prospectively collected donor, recipient and transplant data was performed. **Results.** Overall patient survival at 1-, 3 and 5-year was 84%, 77% and 65%, respectively. Overall graft survival at the same time points