In the remaining 10 patients, histology revealed cirrhosis with active steatohepatitis (n=2), chronic viral hepatitis (n=1) and mild steatosis (n=7). One patient with steatohepatitis was known to be drinking at the time of assessment; the remainder were listed for transplant. Subsequently, one patient with steatosis was found to be drinking and removed. To date, six have been transplanted and survived to 1 year, with two returning to alcohol post-transplant.

**Conclusion** Histological analysis during liver transplant assessment does not determine the decision to list for liver transplantation nor predict the risk of recidivism. As a result, we no longer routinely perform liver biopsy during liver transplant assessment. A significant proportion of patients return to alcohol consumption post liver transplantation.

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**P82**

**HAEMOGLOBIN LEVEL PRIOR TO LIVER TRANSPLANTATION: DOES IT PREDICT THE OUTCOME?**

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**Introduction** Approximately 75% of patients with chronic liver disease have anaemia secondary to iron deficiency, haemorrhage, haemolysis, reduced erythropoiesis, hypersplenism, drugs or haemodilution. In other specialties (cardiac and renal) it has been proven that pre-transplant anaemia impacts negatively on both patient and graft survival. This has not been studied in liver graft recipients.

**Aim** To define whether pre-transplant Hb levels impact on the 5-year survival and the need for re-transplantation.

**Method** Retrospective study of all patients who had liver transplantation (LT) at our centre between 1 August 1988 and 1 August 1999. Patients were included if they had a pre-LT haemoglobin (Hb) level recorded and 5-year follow-up available. Hb is expressed in g/dl. In order to define a survival threshold, patients were classified according to their Hb levels (Hb<8, Hb=8–10, Hb=10–12, Hb>12). Statistical analysis was performed using χ² test, Kaplan–Meier and Student t test.

**Results** 720 patients were included. Mean age [SEM] was 57 [0.6]. Males were 549/720 (49%). 198 patients had Hb>12 g/dl, 318 had Hb between 10 and 12 g/dl, 182 had Hb 8–10 g/dl and 22 had Hb <8 g/dl. Mean age of each group was 41 [1.1], 57 [1.0], 34 [1.5], 24 [3.2] (p<0.01) respectively. The 5-year survival was 60%, 65%, 50% and 59% respectively (p<0.05). There was no difference between these Hb groups in relation to the need for retransplant. Using a Hb level of 10 g/dl as a cut-off value, a Kaplan–Meier survival analysis (see Abstract P82 figure 1) showed that survival was significantly improved in patients with a pre-LT level of ≥10 g/dl (p<0.01). Simultaneous multi-variate binary logistic regression [OR, (CI), p value] showed that age [0.98, (0.97 to 0.99), <0.01], Hb≥10 [1.6, (1.2 to 2.3), <0.01] and a diagnosis of PBC [2.5, (1.3 to 4.6), <0.01] could predict the 5-year survival post-LT.

**Conclusion** This study demonstrates a significantly worse 5-year survival in patients with pre-LT Hb<10 g/dl. Prospective randomised trials to study the impact of correction of pre-LT Hb<10 g/dl on the long-term survival is required to define a treatment strategy.

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**P83**

**COMBINED LIVER AND KIDNEY TRANSPLANTATION: A SINGLE CENTRE EXPERIENCE**

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**Introduction** Combined liver kidney transplantation (CLKT) is an accepted approach to management of patients with dual organ pathology; but may be associated with significant additional post-operative morbidity and mortality in comparison with transplantation of either organ alone.

**Aim** To analyse the experience of CLKT at a single centre.

**Method** Retrospective analysis of all CLKTs performed at our centre between May 1994 and August 2010. Data collected included demographics, indications for CLKT, surgical techniques, post-transplant complications and patient/graft survival.

**Results** Of 2130 liver transplants (LT) performed there were 24 CLKTs—12 male with median age 52 years, Child-Pugh score 7 and MELD 19. Indications for LT were polycystic liver disease 11 (46%), cirrhosis 7 (29%), hepatocellular carcinoma 2 (8%), recurrent PSC/PBC 3 (12%), oxaolsis 1 (4%). The indications for kidney transplantation (KT) were polycystic kidney disease 10 (42%), calcineurin-inhibitor toxicity 4 (17%), chronic kidney graft failure 4 (17%), IgA nephropathy 3 (13%), diabetes 1 (4%), Type II hyperoxaluria 1 (4%), gomerulonephritis 1 (4%). Five patients had prior KT; four chronic graft failure, 1 calcineurin-inhibitor toxicity. 12 patients (50%) were dialysis-dependent pre-transplantation.

During a median follow-up of 1223 days (IQR 550–2264 days) 5 patients died (overall survival 79.2%) with a median time from CLKT to death 947 days (range 4–2575 days). Causes of death: primary non-function of the liver (1), cardiac complications (2) and de novo cancer (2). Seven patients (29%) had at least one episode of histologically proven acute cellular rejection of the liver and 1 (4%) acute renal rejection.

Cumulative 1, 3 and 5-year patient, liver graft and kidney graft survival were 96%, 85%, 75%; 86%, 79%, 62% and 91%, 85%, 75% respectively. 3 patients required further liver transplantation (2 hepatic artery thrombosis, 1 primary non-function). 13 patients required haemodialysis post-operatively. At 3-month follow-up, survivors had median creatinine and eGFR of 129 μmol/l and 43 ml/ min respectively; 1 patient still required dialysis. At 1 year and 5 years median creatinine and eGFR were 155 μmol/l and 38 ml/min respectively. 1 patient resumed haemodialysis 4640 days after CLKT and is on the waiting list for renal re-transplantation.

**Conclusion** CLKT in this cohort had favourable outcomes with excellent patient and graft survival (both organs). Although the number of patients in our study is relatively few, 5-year kidney graft survival rates do not appear inferior to published data for patients undergoing renal transplantation alone.