

following year. They found a similar overall complication rate to Shah *et al.* of 34%, and physical complaints were only significant at 1 week and 1 month following surgery. At the 1-year follow-up point, 46 of the 47 donors said they would donate again if given the chance and all who wished to had returned to work.

In conclusion, right-lobe liver donation, following careful selection and care of patients, can be achieved with low mortality rates and is generally viewed as a positive experience by donors.

Katy Cherry

Original articles Shah SA *et al.* (2005) Analysis and outcomes of right lobe hepatectomy in 101 consecutive living donors. *Am J Transplant* 5: 2764–2769

Verbesey JE *et al.* (2005) Living donor adult liver transplantation: a longitudinal study of the donor's quality of life. *Am J Transplant* 5: 2770–2777

Budesonide in the treatment of autoimmune hepatitis

Standard treatment for autoimmune hepatitis is >2 years' combination therapy with azathioprine and prednisolone. This is effective in inducing remission, but long-term prednisolone use is associated with side effects. Small studies of treatment with budesonide have indicated that it might have similar efficacy to, but fewer side effects than, conventional steroids. In this open, uncontrolled, multicenter phase IIa trial, Wiegand *et al.* showed that oral budesonide can effectively and safely induce remission in treatment naive patients with autoimmune hepatitis.

In all, 12 patients received a 3 mg capsule of budesonide three times daily for 3 months. Seven patients (58%) achieved complete remission, defined as a drop in levels of aspartate aminotransferase and alanine aminotransferase to $\leq 2\times$ the upper limit of normal. Three patients (25%) had a partial response to treatment. Therapy was well tolerated in 10 cases. Three serious adverse events were observed, including one case of steroid-induced type 2 diabetes mellitus.

The goal of therapy for autoimmune hepatitis is cure or long-term control of symptoms via immunosuppression. Further studies are, therefore, needed to assess the long-term efficacy and tolerability of budesonide, and to

compare budesonide therapy for autoimmune hepatitis directly with standard treatment. A larger, controlled, randomized, international study is ongoing, and is expected to address these issues.

Katherine Sole

Original article Wiegand J *et al.* (2005) Budesonide in previously untreated autoimmune hepatitis. *Liver Int* 25: 927–934

Hospitalization rates increase after gastric-bypass surgery

Patients who undergo Roux-en-Y gastric-bypass surgery (RYGB) are more than twice as likely to be hospitalized in the year after their surgery as in the year preceding it, and post-surgical hospitalization is more likely to be for procedure-related complications, a team from California has found.

Between 1995 and 2004, 60,077 California residents underwent RYGB for obesity. Rates of hospitalization for the year preceding and the year following RYGB were 7.9% and 19.3%, respectively ($P < 0.001$). Three-year follow-up data were available for 24,678 patients, 8.4% of whom were hospitalized in the year preceding RYGB, most commonly for obesity-related complications or elective surgeries. In the first, second and third years after RYGB, rates of hospitalization were 20.2%, 18.4% and 14.9%, respectively; in those patients with 5 years of follow-up, hospitalization rates were still raised 5 years after RYGB (13.3%)

Notably, post-RYGB hospitalization in the year following surgery was most commonly for procedure-related complications, but by the third year post-RYGB, most admissions were for elective surgeries, some of which might have been delayed purposefully until the patients had achieved weight-loss targets. Multivariate analysis showed that patients with a higher comorbidity index and those who had previously been hospitalized were more likely to be readmitted within a year of RYGB ($P < 0.001$ for both).

Weaknesses of the study include its retrospective nature and incomplete data on the use of open versus laparoscopic procedures, which did not permit direct comparison of hospitalization rates following these techniques. The likelihood of post-RYGB hospitalization should, however,

be a factor in patients' and doctors' treatment decision-making.

Caroline Barranco

Original article Zingmond DS *et al.* (2005) Hospitalization before and after gastric bypass surgery. *JAMA* **294**: 1918–1924

Efficacy of sacral-nerve stimulation for treatment of fecal incontinence

Sacral-nerve stimulation has an overall success rate of 80% as a treatment for fecal incontinence in patients with a neurologically intact sacral plexus and an anatomically intact anal sphincter and rectum. Results of the first randomized, placebo-controlled, double-blind, crossover study have confirmed the short-term efficacy of treatment.

A total of 34 patients (31 female) with fecal incontinence refractory to conservative treatment underwent implantation of a permanent sacral-nerve electrode. All had shown a $\geq 50\%$ reduction in weekly incontinence and/or fecal urgency episodes during an 8–15-day trial of percutaneous nerve stimulation. Stimulation was optimized for each patient over a 1–3 month postimplantation lead-in phase. Patients were randomly assigned to active or inactive stimulation, then to the opposite mode, for consecutive 2-month periods. Patients selected their preferred mode for a final 3 months. The three patients who overrode the stimulator settings were excluded from the analysis. An additional seven patients withdrew from the trial, four because of device-related adverse events.

Patients' symptoms improved during both active and inactive stimulation, but more individuals felt their symptoms had improved during active stimulation, compared with inactive (24 versus 17 patients). During the final 3 months, 18 of 24 patients opted for active stimulation, and their quality-of-life scores improved and frequency of incontinent episodes fell significantly ($P=0.005$). Similar trends were observed during the crossover periods, but did not reach significance, perhaps because of the shorter treatment duration. Longer-term trials are warranted.

Caroline Barranco

Original article Leroi A-M *et al.* (2005) Efficacy of sacral nerve stimulation for fecal incontinence: results of a multicenter double-blind crossover study. *Ann Surg* **242**: 662–669

TRAIL mediates hepatic steatosis in viral hepatitis and following alcohol intake

Tumor-necrosis-factor-related apoptosis-inducing ligand (TRAIL) has been reported to induce apoptosis in a range of tumor cells while having little or no apparent effect on healthy cells, and recombinant soluble TRAIL has been considered as a cancer therapy agent.

Members of the tumor-necrosis-factor family are involved in the pathogenesis of liver disease, including viral hepatitis, alcoholic liver injury and nonalcoholic steatohepatitis. To investigate the role of TRAIL in viral hepatitis and following alcohol consumption, Mundt and colleagues examined its expression in human liver, in a mouse model of acute adenoviral hepatitis, and after alcohol consumption in healthy mice.

TRAIL was overexpressed in the livers of patients with HCV-induced steatosis. In the mouse models, TRAIL expression did not induce apoptosis in healthy livers; however, in adenovirus-infected livers, TRAIL expression resulted in apoptosis and steatosis. Following alcohol consumption, TRAIL expression resulted in steatosis without apoptosis. Even short durations of alcohol intake increased the susceptibility of hepatocytes to TRAIL-mediated steatosis.

TRAIL is, therefore, a mediator of hepatic steatosis in viral hepatitis and after alcohol intake. These results raise concerns regarding the potential toxicity of TRAIL in clinical trials that include patients with liver disease such as viral hepatitis or alcoholic liver disease. Conversely, inhibition of steatosis was seen following administration of neutralizing anti-TRAIL antibodies, suggesting that TRAIL might also offer a new therapeutic target for hepatic steatosis.

Carol Lovegrove

Original article Mundt B *et al.* (2005) Tumor necrosis factor related apoptosis inducing ligand (TRAIL) induces hepatic steatosis in viral hepatitis and after alcohol intake. *Gut* **54**: 1590–1596

Diagnosis of cystic pancreatic tumors by endoscopic ultrasound-guided needle biopsy

Diagnosis and classification of cystic pancreatic tumors currently relies on a combination of clinical, imaging and laboratory techniques,