IN BRIEF

RESEARCH HIGHLIGHTS

REGENERATIVE MEDICINE

The recovery of injured mouse bladders is hastened by injection of multipotent mesenchymal cells derived from human amnion membrane. After harvest, cells were cultured for 7 days before being injected into the freeze-injured bladder walls of nude mice. Differentiation of the cultured cells into muscle was noted 1 week after implantation. At this point, the contractile response to potassium of treated bladders significantly exceeded that of sham-injected control organs.

Original article Minagawa, T. *et al.* Differentiation of smooth muscle cells from human amniotic mesenchymal cells implanted in the freeze-injured mouse urinary bladder. *Eur. Urol.* doi:10.1016/j.eururo.2009.12.031

BLADDER CANCER

Data from a large radical cystectomy series contradicts the suggestion that radiation therapy compromises subsequent surgical outcomes. There was no significant difference in perioperative mortality between patients who had undergone primary versus postradiation salvage cystectomy for bladder or pelvic malignancy (approximately 420 cases in each group). Incidences of surgical and medical complications were also similar. The exception was stomal stenosis rate, which was higher among radiation-treated patients.

Original article Ramani, V. A. C. *et al.* Differential complication rates following radical cystectomy in the irradiated and nonirradiated pelvis. *Eur. Urol.* doi:10.1016/j.eururo.2009.12.002

UROTHELIAL CARCINOMA

The bladder cuff should always be excised during nephroureterectomy for locally advanced urothelial carcinoma of the renal pelvis. So contend a team who analyzed SEER data from more than 4,200 patients (60% bladder cuff excised, 40% no excision). Failure to excise the bladder cuff increased cancer-specific mortality rates among patients with higher grade disease. By contrast, sparing the bladder cuff is an option for most patients with pT1 and pT2 carcinoma. **Original article** Lughezzani, G. *et al.* Should bladder cuff excision remain the standard of care at nephroureterectomy in patients with urothelial carcinoma of the renal pelvis? A population-based study. *Eur. Urol.* doi:10.1016/ j.eururo.2009.12.001

KIDNEY CANCER

Sorafenib can downsize renal tumors prior to nephrectomy, without compromising surgical outcomes. A small prospective trial was performed to assess the safety and feasibility of sorafenib in the neoadjuvant setting. After about 1 month's treatment with the drug, none of the 28 patients experienced disease progression (from a localized or metastatic state). Primary tumor size and radiographically-assessed tumor density decreased by approximately 10% and 13%, respectively.

Original article Cowey, C. L. *et al.* Neoadjuvant clinical trial with sorafenib for patients with stage II or higher renal cell carcinoma. *J. Clin. Oncol.* doi:10.1200/JC0.2009.24.7759