This week in techniques

Approach	Summary	Licensing status	Publication and contact information
Imaging			
Tumor-targeted imaging agents for cancer surgery	<p>Studies in mice suggest that tumor-targeted nanoparticles could help deliver fluorescent dyes and MRI contrast agents to aid surgical resection. Nanoparticles containing imaging agents were coated with protease-cleavable peptides. In mice, fluorescent dyes and MRI agents accumulated at tumor sites and in tumor cells at higher levels than commercially available tumor-staining reagents. Nanoparticle-treated mice had fewer residual tumor cells following fluorescence-guided tumor resection and had higher survival than mice undergoing tumor resection without fluorescence guidance. Next steps include formulation and GMP manufacturing of the nanoparticles in preparation for clinical trials.</p> <p>The reagents are in preclinical development as an aid to cancer surgery by Avelas Biosciences Inc. VisEn Medical Inc. has fluorescent tumor stains in preclinical development for cancer surgery.</p> <p>SciBX 3(9); doi:10.1038/scibx.2010.295 Published online March 4, 2010</p>	Patent pending; licensed to Avelas Biosciences	<p>Olsen, E.S. <i>et al. Proc. Natl. Acad. Sci. USA</i>; published online Feb. 16, 2010; doi:10.1073/pnas.0910283107</p> <p>Nguyen, Q.T. <i>et al. Proc. Natl. Acad. Sci. USA</i>; published online Feb. 16, 2010; doi:10.1073/pnas.0910261107</p> <p>Contact: Roger Y. Tsien, University of California, San Diego, La Jolla, Calif. e-mail: rtsien@ucsd.edu</p>