

This week in therapeutics

Indication	Target/marker/pathway	Summary	Licensing status	Publication and contact information
Cancer				
Melanoma	Not applicable	<p><i>In vitro</i> and mouse studies suggest lowering levels of the amino acid leucine while inhibiting autophagy could help treat melanoma. In melanoma cells deprived of leucine, inhibition of autophagy with ATG1 autophagy related 1 homolog (ATG1)-targeting small hairpin RNA increased apoptosis compared with that seen using control shRNA. In mice, dietary leucine deprivation plus inhibition of autophagy induced apoptosis and suppressed tumor growth compared with either strategy alone. Next steps include testing the effects of compounds that deprive tumor cells of multiple amino acids.</p> <p>SciBX 4(23); doi:10.1038/scibx.2011.654 Published online June 9, 2011</p>	Patent and licensing status unavailable	<p>Sheen, J.-H. <i>et al. Cancer Cell</i>; published online May 17, 2011; doi:10.1016/j.ccr.2011.03.012</p> <p>Contact: David M. Sabatini, Whitehead Institute for Biomedical Research, Cambridge, Mass. e-mail: sabatini@wi.mit.edu</p>