This week in therapeutics

Indication	Target/marker/pathway	Summary	Licensing status	Publication and contact information
Cancer				
Cancer	Pyruvate kinase M2 isozyme (PKM2)	<p><i>In vitro</i> and cell culture studies suggest PKM2 activators could help treat cancers with low tumor serine levels. High throughput screening and hit optimization identified mid-nanomolar activators of the cancer-associated glycolytic enzyme PKM2. In a human lung cancer cell line, a PKM2 activator inhibited proliferation only when serine was absent from the culture media, supporting a link between cancer cell glycolysis and serine biosynthesis. Next steps could include identifying cancer cell lines that are highly sensitive to PKM2 activators due to alterations in the serine biosynthetic pathway.</p> <p>Agios Pharmaceuticals Inc. has a discovery-stage program targeting PKM2 in cancer.</p> <p>Dynamix Pharmaceuticals Ltd.'s PKM2 activator, DNX-3000, is in preclinical development in cancer.</p> <p>SciBX 5(42); doi:10.1038/scibx.2012.1105 Published online Oct. 25, 2012</p>	Patent and licensing status undisclosed	<p>Kung, C. <i>et al. Chem. Biol.</i>; published online Sept. 21, 2012; doi:10.1016/j.chembiol.2012.07.021</p> <p>Contact: Lenny Dang, Agios Pharmaceuticals Inc., Cambridge, Mass. e-mail: lenny.dang@agios.com</p>