

This week in therapeutics

Indication	Target/marker/pathway	Summary	Licensing status	Publication and contact information
Cancer				
Mesothelioma	Cyclin dependent kinase 1 (CDK1; CDC2)	<p>Mouse and <i>in vitro</i> studies identified analogs of the bis(indolyl)imidazole alkaloid nortopsentin that could help treat diffuse malignant peritoneal mesothelioma (DMPM). In two human DMPM cell lines, five of the nortopsentin analogs inhibited proliferation with micromolar and submicromolar IC₅₀ values. In a mouse xenograft model of human DMPM, the three most potent analogs decreased tumor growth compared with vehicle. In a panel of kinases, the three most potent analogs were shown to inhibit CDK1 with submicromolar IC₅₀ values. Next steps could include testing the lead analogs in additional models of mesothelioma.</p> <p>Merck & Co. Inc. and Ligand Pharmaceuticals Inc. have the CDK inhibitor dinaciclib in Phase II/III testing to treat chronic lymphocytic leukemia (CLL) and Phase II or earlier testing for other cancers. At least six other companies have CDK inhibitors in Phase II or earlier testing for various cancers.</p> <p>SciBX 6(36); doi:10.1038/scibx.2013.992 Published online Sept. 19, 2013</p>	Patent and licensing status unavailable	<p>Carbone, A. <i>et al. J. Med. Chem.</i>; published online Aug. 6, 2013; doi:10.1021/jm400842x</p> <p>Contact: Nadia Zaffaroni, IRCCS Foundation National Institute of Cancer, Milano, Italy e-mail: nadia.zaffaroni@istitutotumori.mi.it</p> <p>Contact: Patrizia Diana, University of Palermo, Palermo, Italy e-mail: patrizia.diana@unipa.it</p>