

This week in therapeutics

Indication	Target/marker/ pathway	Summary	Licensing status	Publication and contact information
Autoimmune disease				
Multiple sclerosis (MS)	Midkine	<p>Studies in mice suggest that antagonizing midkine, a heparin-binding growth factor, could be useful for treating MS and other autoimmune diseases. In mice, midkine deficiency attenuated myelin oligodendrocyte glycoprotein (MOG)-induced encephalomyelitis by increasing Treg cells in the peripheral lymph nodes and decreasing autoreactive T helper type 1 (Th1) and Th17 cells. Antimidkine RNA aptamers reduced clinical symptoms of encephalomyelitis. Preclinical testing of antimidkine RNA aptamers to treat MS is ongoing.</p>	Patented by Nagoya University; licensed by Ribomic Inc.	<p>Wang, J. <i>et al. Proc. Natl. Acad. Sci. USA</i>; published online March 6, 2008; doi:10.1073/pnas.0709592105</p> <p>Contact: Akio Suzumura, Nagoya University Graduate School of Medicine, Nagoya, Japan e-mail: suzumura@riem.nagoya-u.ac.jp</p> <p>Contact: Hideyuki Takeuchi, same affiliation as above e-mail: htake@riem.nagoya-u.ac.jp</p>