1043-60-206 **Erhan Bayraktar** (erhan@umich.edu), Ann Arbor, MI 48109, and **Hao Xing*** (haoxing@umich.edu), Ann Arbor, MI 48109. *Pricing Asian Options for Jump Diffusions.*

We construct a sequence of functions that uniformly converge (on compact sets) to the price of Asian option, which is written on a stock whose dynamics follows a jump diffusion, exponentially fast. Each of the element in this sequence solves a parabolic partial differen- tial equation (not an integro-differential equation). As a result we obtain a fast numerical approximation scheme whose accuracy versus speed characteristics can be controlled. We analyze the performance of our numerical algorithm on several examples. (Received August 27, 2008)