Abstract Submitted
for the APR14 Meeting of
The American Physical Society

On the dynamics of spinning binary black holes and some astrophysical consequences CARLOS LOUSTO, MANUELA CAMPANELLI, JAMES HEALY, IAN RUCHLIN, YOSEF ZLOCHOWER, Rochester Institute of Technology — We numerically study the final inspiral orbital dynamics of highly spinning binary black holes. In particular the effects of precession on the total radiated gravitational energy, angular and linear momentum. We discuss the main astrophysical and observational consequences of the spin dynamics and recoils when the black hole binary is immersed in gaseous environment.

Carlos Lousto
Rochester Institute of Technology

Date submitted: 06 Jan 2014 Electronic form version 1.4