Meeting: 1003, Atlanta, Georgia, SS 12A, AMS-SIAM Special Session on Stochastic, Large-Scale, and Hybrid Systems, I

1003-34-922 S G Leela* (Vatsala@louisiana.edu) and V Lakshmikantham. Stability of Hybrid Systems with Partially Invisible Solutions. Preliminary report.

A stable dynamic System relative to some equilibrium may breakdown due to an unexpected disturbance. After a finite time entertained by suitable changes and repairs, a new dynamic system may result with an abrupt impulsive change, having a difficult equilibrium. The question is whether the stability is maintained by the new dynamic system. This problem is investigated in the frame work of hybrid system. (Received October 01, 2004)