Modeling the dynamics of stress propagation in disaster situations is crucial for effective emer gency response planning and risk management.In this paper, we present a macroscopic first−order compartmental advection−diffusion−reaction model that describes how populations in two separate interconnected zones ?1 and ?2, via their human behaviors (compartments) that represent the stressed and non−stressed populations respectively, interact via stress contagion within each zone and migration between these two zones, spatial propagation is also considered.