## Pelling – Ch. 3, The Vulnerability of Cities – Natural Disaster and Social Resilience

Pelling began by finding fault with technical and engineering approaches to risk management. He argued that they "overlook or downplay political, economic and social forces." First he described the components of environmental risk and broke human vulnerability into exposure, resistance, and resilience. He then traced the evolution of risk analysis including Sen's work on entitlements and Burton's discussion of coping strategies and adaptation. These works brought human and social dimensions into the discussion of vulnerability. Pelling went on to apply these ideas developed in rural contexts and place them in an urban context using his concept of adaptive potential. He separates political and social assets from economic assets and concentrates on how local and non-state actors can build up these assets and reduce vulnerability. He identified two social responses to risk: 1) coping strategies mobilizing social networks and 2) institutional modification of political structures. Pelling argues that these responses can be triggered by either background stress or environmental stress.

## Pelling – "Assessing Urban Vulnerability and Social Adaptation to Risk"

This article also laid out Pelling's idea of adaptive potential and applied it to a case study. While discussing how to build adaptive potential, Pelling mentioned the different types of social capital. The three types of social capital are 1) bridging capital – ties b/w individuals, 2) bonding capital – ties that facilitate community organization, and 3) linking capital – ties b/w local and extra-local actors. This aside helped me understand the how to go about strengthening social capital.

## Bull-Kamanga, et all – "From Everydoay Hazards to Disasters: The accumulation of Risk in Urban Areas"

This paper examined how urbanization affects disaster risk. The authors also focused on hazards too small to qualify as a disaster. They argue these small events highlight the risks faced by urban populations. The article views urban areas as a crucible increasing risks by concentrating people and hazards in a single area. When the authors asked why risks are not being reduced, they pointed to social and political factors. They conclude by suggesting that vulnerabilities must be understood and reduced at the local level.

## Reactions

The case studies and articles reminded me of my experiences after tropical storms in the Caribbean. My landlord had the economic assets to mitigate vulnerability after experiencing flooding. Our neighbors did not. They turned to their social network and neighbors. Those with the fewest economic assets had the least access to social capital. They ended up at the government run shelters and as soon as possible rebuilt in the same vulnerable areas. Where I lived, few CBOs were active outside the church. How can bonding capital be developed in the absence of a tradition of community activism? Reducing vulnerability through social organizations is a powerful idea. Can this opportunity be brought back to rural areas or are urban population densities necessary for success? After clean up following storms, the community did not take ownership of mitigation and instead looked to the central government. In order for adaptive potential to be sustainable there must be local involvement. How can this be encouraged? In light of the Bull-Kamanga article, how effective would a disaster strategy be that addressed regular small hazards? Is local action enough or do city-wide interventions need to be made?