Violence as an Infectious Disease: the Value of Contagion

The Contagion of Violence
A workshop of the Forum on Global Violence Prevention
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Infectious Disease

• A *disease* caused by the entrance into the body of organisms (as bacteria, protozoans, fungi, or viruses) which grow and multiply there; a germ *disease.*
Contagious

• Definition: Transmissible by direct or indirect contact; communicable; capable of transmitting disease

• A contagious disease is a subset of infectious disease that is especially infective or easily transmitted.
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- **Infectious diseases**, also known as transmissible diseases or communicable diseases comprise clinically evident illness (i.e., characteristic medical signs and/or symptoms of disease) resulting from the infection, presence and growth of pathogenic biological agents in an individual host organism. In certain cases, infectious diseases may be asymptomatic for much or even all of their course in a given host. In the latter case, the disease may only be defined as a "disease" (which by definition means an illness) in hosts who secondarily become ill after contact with an asymptomatic carrier. An infection is not synonymous with an infectious disease, as some infections do not cause illness in a host.\[1\]

- The term infectivity describes the ability of an organism to enter, survive and multiply in the host, while the infectiousness of a disease indicates the comparative ease with which the disease is transmitted to other hosts.\[2\] Transmission of pathogen can occur in various ways including physical contact, contaminated food, body fluids, objects, airborne inhalation, or through vector organisms.\[1\]

- Infectious diseases are sometimes called "contagious" when they are easily transmitted by contact with an ill person or their secretions (e.g., influenza). Thus, a contagious disease is a subset of infectious disease that is especially infective or easily transmitted. Other types of infectious/transmissible/communicable diseases with more specialized routes of infection, such as vector transmission or sexual transmission, are usually not regarded as "contagious," and often do not require medical isolation (sometimes loosely called quarantine) of victims.

- From Wikipedia, the free encyclopedia
Basic Elements of Infectious Disease Model

- **Stages of disease**
  - Begin with uninfected population—
  - Ways to acquire infection
  - Latency

- **Susceptibility**
  - Cultural disruption, gender and inequality
  - Environmental factors: High risk areas: prisons, poverty as a risk factor, refugee camps,
  - Mental illness—Fetal Alcohol Syndrome, Personality disorders

- **Epidemiology**
  - Different types of violence are different diseases, each with own characteristics, interconnected
  - Modeling
  - What's the problem, what are the causes, what works to prevent it, how do you do it
Basic Elements of Infectious Disease Model

• Immunity
  – Immune deficiency (like cultural destruction)

• Mode of spread
  – Person to person, common source, Inter-generational transmission
  – Endemic and epidemic spread (poor people suffer when disease is not eradicated)
  – Migration and disruption

• Prevention
  – Immunization (when does exposure produce immunity, when does it produce diseases? Length of protection?)
  – Herd immunity (can it be produced?)
  – Risk reduction (reducing access to guns, weapons, etc)
  – Disease elimination and eradication

• Treatment
What are the benefits of viewing violence as an infectious disease?

- Helps us to understand aspects of the problem
  - Violence is something that affects some people (vs there are evil or bad people)
  - Understand complex interplay of genetics, development, mind and body, environment
- Helps to design a better research agenda (interdisciplinary)
- Helps to design interventions
- Helps to communicate and promote synergies
  - To health community and the general public
  - To Criminal Justice
  - To Education
  - To child development, social services
- Helps to get attention to a long-neglected problem, focus on prevention—gets people to pay attention to a problem because it may threaten everyone—eg think about violence comes to suburbia, school shootings coming to your neighborhood soon, eg—"I and It" vs "I and Thou"
- May give people more of a sense of hope---transmission can be interrupted, violence can be prevented, cured, can use scientific tools
What are the problems with viewing violence as an infectious disease?

• May stigmatize some communities
• May lead to further isolation if people fear violence will spread to them
• May short-change some types of violence in bringing more attention to youth violence
• May divert attention from evidence-based interventions
Questions

• How can this approach help understand the relationship of violence to mental illness?
• What are the elements of violence as contagion that we can take from youth violence and apply to suicide and self-harm, elder abuse, child neglect and abuse, intimate partner violence?
• How do we learn about contagion in low- and middle-income countries?
• How do we create a research agenda for Violence as Contagion? How do we design and carry out rigorous evaluations?
Where do we go from here?

• Report will be prepared
• What you have learned--please continue to think about this, discuss it, share it, apply it.
• Keep us informed, continue to participate in these workshops
• Keep up the tremendous work—what you do makes a difference!
This business of saving lives touched by violence is very important work

• “We do not believe in ourselves until someone reveals that deep inside us something is valuable, worth listening to, worthy of our trust, sacred to our touch. Once we believe in ourselves we can risk curiosity, wonder, spontaneous delight or any experience that reveals the human spirit.”

  • ee cummings (thanks to Jim Mercy)