

Kati Davis
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N442 Contagion Video handout

Use your textbooks to understand epidemiology and nursing implications for communicable diseases.

1. Do you think the discussion with the physician right after his wife dies realistically portrays how a medical provider could explain such a phenomenon? Sadly yes, physicians do not have all the answers which is frustrating for the deceased's spouse. A physician may lack empathy and seem very cut and dry in moments.
2. How many times do you touch your face during the movie? where they really touch their face? hopefully less than 5 times. I try to make a conscious effort to not touch my face. Don't know.

What do they quote as the range in which people touch their face in an hour?

2,000 - 3,000 a day

3. Identify the chain of infection:

Infectious agent → reservoir → portal of exit → mode of transportation → portal of entry → susceptible host

4. What is/are the infectious agent?

Infectious agents are bacteria, fungi, viruses, and parasites.

5. What diseases did they rule out?

Polio, swine flu, flu

6. What is the reservoir?

The habitat in which the agent grows, lives, and multiplies such as oceans, soils, & forests

7. What are the portals of entry? The portals of exit?

Entry: mouth, nose, and eyes

Exit: mouth & nose

8. What are the fomites? Can the virus live for 6 days on a box? ← No.

Sinks, restaurant glasses/silverware, railing, walls in public spaces (trains). Anything that can be touched

9. What is the process they take to determine what the disease is?

Process of elimination/determining where it came from/ understanding virus on cellular level.

10. What agencies get involved?

The CDC, WHO, homeland security

11. What precipitates these agencies getting involved?

The autopsy reports showed irregularities

12. What is the role of these agencies?

The role is to find out what the virus is, its incubation, mortality rate, and guidance

13. What is the time frame from onset to manifestations of symptoms i.e. incubation period and then to death?

3-6 days

14. What are the actions taken by the CDC in terms of containing the infection?

Quarantine, investigation, contact tracing, & work in the lab

15. What is an "R naught" (R_0)?

The contagiousness and transmissibility of infectious pathogens

16. What do the investigators do to protect themselves?

N95, PPE, gloves, hazmat suit

17. Calculate the mortality rate from the disease in the first 7 days in Minneapolis?

87 cases & 15 deaths

1790

18. What does the epidemiologist from the WHO do to track the progression of the disease?

Contact traced to see where the virus originated

19. What is an epidemic? versus a Pandemic?

An epidemic is a disease that affects a large number of people within a community/population. A pandemic is an epidemic that's spread over multiple countries or even continents

20. What is a quarantine?

Quarantine separates & restricts the movement of people who have been exposed to a contagious disease.

21. Why does the husband not get sick? What type of immunity does he have?

Natural active because he was exposed and did not get sick.

22. What are the symptoms of the virus?

fever, cannot swallow, headache, seizures

23. How do they develop a vaccine?

They tested live and attenuated vaccines against infected monkeys

24. How is the vaccine administered?

IM and intranasally

25. Is it a live virus vaccine versus an attenuated virus vaccine?

Attenuated

What is the difference?

attenuated means the virus is weakened or thinned vs live is the virus in its whole form

26. What sort of immunity does the vaccine provide?

Active immunity

27. How can the vaccine be administered to the greatest number of people?

Accessible areas, low cost, short weigh times, available to a broad range of ages

28. How does the environment, transportation, communication, essential services, government, and health care facilities get involved?

They were notified and followed the virus

29. In your opinion do local, national, and global politics make a difference in the development and distribution of the vaccine?

Yes

Explain your opinion?

Their access to funds and other resources make vaccine distribution easier.

30. Does it make a difference if there is a rush to develop the vaccine?

Yes, they have to work around the clock and expedite if there is a rush.

31. Does it make a difference that a vaccine may have other side effects? Ex:
1976—Swine Flu vaccine.

The swine flu vaccine caused death which scares people away from getting it.

32. As a community health nurse: Identify the primary, secondary, and tertiary prevention methods that could be used for infectious diseases at both the individual and community levels.

Primary: educating, handwashing, masking

Secondary: vaccines, screening, quarantine

Tertiary: grieving, managing the disease

33. What are the steps that a community needs to do to respond to an infectious disease outbreak?

Quarantine, contact trace,
appropriate PPE, social
distancing