Global Health

Lecture 1

What is the definition of global health?

- a. Health problems, issues, and concerns that are limited to a single country
- b. Health problems, issues, and concerns that transcend national boundaries and require cooperative actions and solutions
- c. Health problems, issues, and concerns that are only influenced by circumstances or experiences within a country
- d. Health problems, issues, and concerns that are solely addressed through actions within a single country

Answer: B.

What does research in global health emphasize?

- a. Developing the evidence-base for policy based on a single discipline
- b. Highlighting the effects of national determinants of health
- c. Using evidence-based information constructively in a single country
- d. Using a full range of disciplines and emphasizing the effects of trans-national determinants of health

Answer: D.

What does action in global health emphasize?

- a. Using evidence-based information constructively in all countries to improve health and health equity
- b. Using a single discipline to improve health in all countries
- c. Focusing on the underlying social, economic, environmental, and political determinants of health in a single country
- d. Using health promotion strategies only in high-income countries

Answer: A.

What is the focus of promoting or improving health in global health?

- a. Using a single discipline to improve health
- b. Using health promotion strategies only in low-income countries
- c. Using a full range of strategies directed at the underlying social, economic, environmental, and political determinants of health
- d. Focusing on the diseases and conditions of middle and high-income countries

Answer: C.

How does global health position health for all?

- a. At the forefront of multi-sectoral approaches to health improvement
- b. As a state rather than a goal
- c. Solely through actions within a single country
- d. By focusing only on preventions rather than cures

Answer: A.

What is the definition of global health?

- a. Health problems that only affect one country
- b. Health issues that are not influenced by circumstances in other countries
- c. Health problems, issues, and concerns that transcend national boundaries and require cooperative actions and solutions
- d. Health problems that are limited to low-income countries

Answer: c

What are the three basic functions of global health?

- a. Generating new knowledge, distributing knowledge, and applying knowledge
- b. Distributing new knowledge, generating theories, and applying intervention strategies
- c. Applying theories, generating solutions, and distributing knowledge
- d. Applying intervention strategies, distributing knowledge, and generating new theories

Answer: a

Why is investing in global health important?

- a. It reduces the cost of future pandemics
- b. It improves the ability of individuals in developing countries to contribute to their economies
- c. It leads to a healthy workforce that misses fewer days of work
- d. All of the above

Answer: d

What does it mean to think globally and act locally in the context of global health?

a. To only focus on global health issues and solutions

- b. To prioritize local health problems over global health problems
- c. To adopt solutions proven effective in other settings and learn from each other at different levels
- d. To only conduct global health research and exchange findings across the globe

Answer: c

When can a research project be considered global?

a. If it involves multiple countries with investigators from diverse backgrounds

- b. If it targets a local population with investigators from only one or two local institutions
- c. If it has a global impact, regardless of the number of countries involved
- d. If it is supported with local data, regardless of the research question

Answer: a + c

Global health focuses on issues that have a:

- a. Local impact
- b. Regional impact
- c. Global impact
- d. National impact

Answer: c

Global health can address issues that:

- a. Have already affected a large number of people or countries across the globe
- b. Have only affected a small number of people or countries
- c. Are limited to a specific region
- d. Are limited to a single country

Answer: a

Global health issues often require:

- a. Local collaboration and cooperation
- b. National collaboration and cooperation
- c. Cross-cultural, international, and/or global collaboration and cooperation
- d. No collaboration and cooperation

Answer: c

Global health interventions are framed as global solutions because:

- a. They only benefit a small number of population
- b. They are limited to a specific region
- c. They benefit a large number of population
- d. They have no impact on population

Answer: c

Global health coverage includes:

- a. Social sciences, behavioral sciences, law, economics, history, engineering, biomedical sciences, and environmental sciences
- b. Biomedical sciences only
- c. Social sciences and biomedical sciences only
- d. Law and engineering only

Answer: a

Important table

	Global Health	International Health	Public Health
Geographical reach	Focuses on issues that directly or indirectly affect health but that can transcend national boundaries	Focuses on health issues of countries other than one's own, especially those of low income and middle income	Focuses on issues that affect the health of the population of a particular community or country
Level of cooperation	Development and implementation of solutions often require global cooperation	Development and implementation of solutions usually require binational cooperation	Development and implementation of solutions do not usually require global cooperation
Individuals or populations	Embraces both prevention in populations and clinical care of individuals	Embraces both prevention in populations and clinical care of individuals	Mainly focuses on prevention programs for populations
Access to health	Health equity among nations and for all people is a major objective	Seeks to help people of other nations	Health equity within a nation or community is a major objective
Range of disciplines	Highly interdisciplinary and multidisciplinary within and beyond health sciences	Embraces a few disciplines but has not emphasized multiclisciplinarity	Encourages multidisciplinary approaches, particularly within health sciences and with social sciences

Inequalities vs. Inequities

<u>Health Inequalities</u> – "the uneven distribution of health in or between populations." This can include differences like older adults tend to require more medications than younger adults, or the health needs of women are different than men, due to pregnancy.

<u>Health Inequities</u> – "the presence of systematic disparities in health between more and less advantaged social groups." For example, populations in poor countries tend to have higher rates of childhood mortality than populations in wealthy countries.

Lecture 2

What is the literal meaning of the term "epidemiology"? a) The study of diseases in individuals b) The study of diseases in communities c) The study of diseases in populations

d) The study of diseases in specified groups

Answer: c

What is the main focus of epidemiology?

a) Studying diseases in individuals

b) Studying diseases in specific communities

c) Studying the distribution and determinants of health-related states and events in populations

d) Studying risk factors for diseases in clinical practice

Answer: c

What is the investigative method used in epidemiology?

a) Studying diseases in individuals

b) Studying diseases in communities

c) Studying risk factors for diseases

d) Studying the cause or source of diseases in populations or groups

Answer: d

What does epidemiology involve in terms of studying health-related diseases or events?

a) Studying diseases in isolation

b) Studying diseases in relation to risk factors only

c) Characterizing the distribution of health status, diseases, or other health problems in populations

d) Studying diseases in specific individuals

Answer: c

What is the role of epidemiology in public health and preventive medicine?

a) It serves as the foundation and logic of interventions made in the interest of public health and preventive medicine.

b) It is not related to public health and preventive medicine.

c) It focuses only on outbreak investigation and data collection.

d) It is not regarded as important in evidence-based medicine.

Answer: a

What other scientific disciplines may epidemiologists draw upon in their work?

a) Biology only

b) Social science disciplines including sociology and philosophy only

c) No other disciplines

d) Biology, social science disciplines, and other relevant disciplines Answer: d

What range of work do epidemiologists engage in when studying communicable and non-communicable diseases?

a) Only outbreak investigation

b) Only study design and data collection

c) Only statistical modeling and documentation of results

d) Outbreak investigation, study design, data collection, analysis, and documentation of results Answer: d

What are the purposes of epidemiology?

a. To explain the etiology (cause) of a single disease or group of diseases using information management.

b. To study the history and trends of a disease.

c. To determine if data are consistent with proposed hypothesis.

d. To provide a basis for developing control measures and prevention procedures for groups and at-risk populations.

e. All of the above.

Answer: e.

Who are epidemiologists?

a. Physicians

b. Veterinarians

c. Scientists

d. Other health professionals

e. All of the above.

Answer: e.

What do epidemiologists do?

a. Investigate disease outbreaks and search for the cause of disease.

b. Identify people who are at risk of disease.

c. Determine how to control or stop the spread of disease.

d. Prevent disease from happening again.

e. All of the above.

Answer: e.

Examples of the types of community health problems investigated by epidemiologists include:

a. A measles outbreak on a small college campus.

b. A global influenza pandemic.

c. An increase in homicide in a community.

d. A national surge in violence.

e. An increase in the number of cancer cases.

f. All of the above.

Answer: f.

What questions do epidemiologists typically ask when gathering information about disease outbreaks? a. Who is sick?

b. What are their symptoms?

c. When did they get sick?

d. Where could they have been exposed to the illness?

e. All of the above.

Answer : e

What is the main purpose of studying the history and trends of a disease in epidemiology?

a. To determine the cause of the disease.

b. To understand how the disease has evolved over time.

c. To identify patterns and risk factors associated with the disease.

d. To develop prevention and control measures for the disease.

e. All of the above.

Answer: e.

What is the role of epidemiologists in developing control measures and prevention procedures for groups and at-risk populations?

a. To identify the groups and populations at risk for a particular disease.

b. To develop strategies for preventing the spread of the disease among at-risk groups.

c. To implement control measures such as vaccination campaigns, quarantine protocols, and public health interventions.

d. To evaluate the effectiveness of control measures and adjust them as needed.

e. All of the above.

Answer: e.

How do epidemiologists contribute to determining if data are consistent with proposed hypotheses?

a. By analyzing and interpreting data collected from various sources.

b. By comparing observed data with expected outcomes based on proposed hypotheses.

c. By conducting statistical analyses to determine the strength and significance of associations.

d. By critically evaluating the quality and reliability of data.

e. All of the above.

Answer: e.

What is the significance of epidemiologists being called "Disease Detectives"?

a. It reflects their role in investigating disease outbreaks and determining the cause of diseases.

b. It highlights their expertise in gathering and analyzing data related to disease patterns and trends.

c. It emphasizes their role in identifying at-risk populations and developing prevention strategies.

d. It showcases their ability to work collaboratively with other health professionals in addressing public health issues.

e. All of the above. Answer: e. What is the ultimate goal of epidemiology?

a. To understand the causes and patterns of diseases in populations.

b. To prevent and control the spread of diseases.

c. To improve public health and well-being.

d. To contribute to evidence-based decision making in public health policy.

e. All of the above.

Answer: e.

How do epidemiologists use cohort study designs?

a. To compare groups and determine the role of risk factors.

b. To collect information about health events or problems.

c. To make inferences based on collected data.

d. To test hypotheses using analytical study designs.

e. None of the above.

Answer: a.

Why are epidemiology studies not as useful as experimental studies for predicting and preventing adverse health effects?

a. Because they can only be conducted after people have been exposed to a chemical.

b. Because they produce less reliable data that can be difficult to interpret.

c. Because they cannot confirm causation between a chemical exposure and a health effect.

d. Because they cannot control the conditions under which people are exposed.

e. None of the above.

Answer: a.

What is a confounder in epidemiology?

a. A variable that can cloud our understanding of the relationship between a chemical exposure and observed health effects.

b. A type of measurement error that can occur in epidemiology studies.

c. A seasonal pattern in disease frequency.

d. A historical trend in disease occurrence.

e. None of the above.

Answer: a.

What are some personal characteristics that are examined in descriptive epidemiology?

a. Age, gender, socio-economic status, marital status, ethnicity/race/genetic profile, behavior/habits.

b. Geographical location, climate effects, urban/suburban/rural status, relation to environmental exposure.

c. Time trends, seasonal patterns, cyclical patterns, outbreaks/clusters, historical trends.

d. Exposure to chemicals, measurement errors, confounding variables.

e. None of the above.

Answer: a.

What is the main focus of examining "place" in descriptive epidemiology?

a. Geographical location and climate effects.

b. Age, gender, socio-economic status, marital status, ethnicity/race/genetic profile, behavior/habits.

c. Time trends, seasonal patterns, cyclical patterns, outbreaks/clusters, historical trends.

d. Exposure to chemicals and measurement errors.

e. None of the above.

Answer: a

What is the main focus of examining "time" in descriptive epidemiology?

a. Geographical location and climate effects.

b. Age, gender, socio-economic status, marital status, ethnicity/race/genetic profile, behavior/habits.

c. Time trends, seasonal patterns, cyclical patterns, outbreaks/clusters, historical trends.

d. Exposure to chemicals and measurement errors.

e. None of the above.

Answer: c.

What are some limitations of descriptive epidemiology?

a. It can only describe what exists in a population, but cannot establish causation.

b. It relies on observational data, which may be less reliable and difficult to interpret.

c. It cannot control the conditions under which people are exposed.

d. It may have confounding variables and measurement errors.

e. All of the above.

Answer: e.

What are the two main types of study designs used in analytic epidemiology?

a. Cohort study design and case-control study design.

b. Descriptive study design and experimental study design.

c. Cross-sectional study design and ecological study design.

d. Prospective study design and retrospective study design.

e. None of the above.

Answer: a.

Why is it considered unethical to randomly allocate humans into exposed and unexposed groups in epidemiology studies?

a. Because it is expensive and time-consuming.

b. Because it may cause harm or expose individuals to risks.

c. Because it is not practical in real-life settings.

d. Because it violates ethical principles of autonomy and beneficence.

e. None of the above.

Answer: d.

What are some factors that can impact the reliability of epidemiology studies?

a. Confounding variables and measurement errors.

b. Small sample size.

c. Errors in exposure assessment.

d. Publication bias.

e. All of the above.

Answer: e.

What is the main goal of descriptive epidemiology?

a. To describe what exists in a population by person, place, or time variables.

b. To establish causation between a chemical exposure and a health effect.

c. To randomly allocate humans into exposed and unexposed groups.

d. To control the conditions under which people are exposed.

e. None of the above.

Answer: a.

What is the purpose of surveillance in epidemiology?

a) To identify cases of diseases for immediate treatment

b) To detect clusters of diseases

c) To monitor trends of disease outbreaks

d) All of the above

Answer: d

What is the main difference between active surveillance and passive surveillance?

a) Active surveillance is conducted when an outbreak is detected, while passive surveillance does not involve initiating action by the health agency.

b) Active surveillance involves visiting hospitals, while passive surveillance involves collecting information without initiating action.

c) Active surveillance is more effective in detecting cases, while passive surveillance is less effective.

d) There is no difference between active and passive surveillance.

Answer: a

What is the purpose of screening in epidemiology?

a) To identify cases of diseases for immediate treatment

b) To detect clusters of diseases

c) To monitor trends of disease outbreaks

d) To identify unrecognized diseases or conditions for early detection and intervention Answer: d

What are some limitations of screening programs?

a) False positive results

b) False negative results

c) Overdiagnosis

d) All of the above

Answer: d

What is the main goal of outbreak investigation in epidemiology?

a) To identify the source of the outbreak

b) To determine the mode of transmission

c) To implement appropriate control measures

d) All of the above

Answer: d

What is the criteria used to assess causation in epidemiology?
a) Hill's criteria for causation
b) Koch's postulates
c) Pearson's correlation coefficient
d) None of the above
Answer: a

Which study design is considered the gold standard for assessing causation in epidemiology?a) Experimental studiesb) Observational studies

c) Cross-sectional studies

d) Case series studies

Answer: a

What is confounding in epidemiological studies?

a) A factor that is associated with both the exposure and the outcome, and may distort the observed association between them

b) A factor that is randomly assigned to study participants

c) A factor that is not associated with the exposure or the outcome

d) A factor that is only present in experimental studies

Answer: a

Which of the following is not a criterion for causation according to Hill's criteria?

- a) Temporality
- b) Consistency
- c) Randomization
- d) Biological plausibility

Answer: c

What is the main goal of assessing causation in epidemiology?

a) To establish cause-and-effect relationships between exposures and outcomes

b) To identify cases of diseases for immediate treatment

c) To detect clusters of diseases

d) To monitor trends of disease outbreaks

Answer: a

What is the main purpose of outbreak investigation in epidemiology?

a) To identify cases of diseases for immediate treatment

b) To determine the dynamics of a disease outbreak

c) To monitor trends of disease outbreaks

d) To implement control and prevention measures

Answer: b

What is the minimum requirement for determining an outbreak?
a) Two or more cases of a disease that are epidemiologically linked
b) One case of a rare disease
c) Syndromic surveillance data alerts
d) Populations studied
Answer: a

What is the purpose of assessing causation in epidemiology?
a) To identify cases of diseases for immediate treatment
b) To establish cause-and-effect relationships between exposures and outcomes
c) To detect clusters of diseases
d) To implement control and prevention measures
Answer: b

What is the main focus of descriptive epidemiology?

a) Studying groups of people rather than individuals

b) Identifying causes or factors associated with increased risk of disease

c) Characterizing health events in terms of time, place, and person

d) Studying a variety of health-related events

Answer: c

What are determinants in epidemiology?

a) Factors associated with increased risk of disease

b) Patterns of health events within groups in a population

c) Early response to invasion by a foreign substance or injury

d) Exposure to various lifestyle, behavioral, and environmental factors Answer: a

What is the meaning of "exposure" in epidemiological studies?

a) Studied populations

b) Groups of people

c) Risk factors for disease

d) Abnormal state of the body

Answer: c

What is the definition of disease in epidemiology?

a) Response to invasion by a foreign substance or injury

b) Abnormal state of the body

c) Pattern of health events within groups in a population

d) Alteration of normal functioning of the organism

Answer: d

What are pathogens?

A. Organisms or substances that are capable of producing diseases.

B. Antigens that trigger immune response.

C. Cells that produce toxins.

D. Antibiotics that kill microorganisms.

Answer: A

What is pathogenesis?

A. The severity of disease that the agent causes in the host.

B. The capacity of a microorganism to enter into and grow in or upon tissues of a host.

C. The development, production, or process of generating a disease.

D. The ongoing, usual level of, or constant presence of a disease in a given population. Answer: C

What is the definition of susceptibility?

A. The state in which a person or animal is capable of being infected with a microorganism.

B. The capacity of a microorganism to enter into and grow in or upon tissues of a host.

C. The severity of disease that the agent causes in the host.

D. The interval between disease onset and clinical diagnosis. Answer: A.

What is virulence?

A. The severity of disease that the agent causes in the host.

B. The capacity of a microorganism to enter into and grow in or upon tissues of a host.

C. The development, production, or process of generating a disease.

D. The ongoing, usual level of, or constant presence of a disease in a given population. Answer: A.

What is incubation period?

A. A period of sub-clinical or non-obvious pathologic changes following an exposure.

B. The state in which a person or animal is capable of being infected with a microorganism.

C. The capacity of a microorganism to enter into and grow in or upon tissues of a host.

D. The interval between disease onset and clinical diagnosis.

Answer: A

What are toxins?

A. Substances that are capable of producing diseases.

B. Antigens that trigger immune response.

C. Cells that produce toxins.

D. Poisonous substances that are a specific product of the metabolic activities of a living organism. Answer: D.

What are antibiotics?

A. Substances that are capable of producing diseases.

B. Antigens that trigger immune response.

C. Cells that produce toxins.

D. Substances produced by or derived from microorganisms that can inhibit or kill other microorganisms. Answer: D. What does endemic mean?

A. The severity of disease that the agent causes in the host.

B. The ongoing, usual level of, or constant presence of a disease in a given population.

C. A group of cases in a specific time and place that may or may not be greater than the expected rate.

D. The development, production, or process of generating a disease.

Answer: B

What does pandemic mean?

A. Outbreak or occurrence of one specific disease from a single source, in a group population, community, or geographical area, in excess of the usual level of expectancy.

B. Epidemic that is widespread and affects an exceptionally high proportion of the population in multiple regions or countries.

C. A group of cases in a specific time and place that may or may not be greater than the expected rate.

D. The capacity of a microorganism to enter into and grow in or upon tissues of a host. Answer: B.

What is the definition of herd immunity?

A. The severity of disease that the agent causes in the host.

B. The capacity of a microorganism to enter into and grow in or upon tissues of a host.

C. The level of resistance in a population to the spread of a disease due to a sufficient proportion of

individuals having immunity, either through vaccination or previous infection.

D. The interval between disease onset and clinical diagnosis.

Answer: C.

What is the purpose of vaccination?

A. To treat an ongoing infection.

B. To cure a disease.

C. To provide immunity to a different disease.

D. To prevent the occurrence of specific infectious diseases.

Answer: D.

What are the three main strategies to control infectious diseases?

A. Quarantine, treatment, and isolation.

B. Vaccination, hygiene, and antibiotics.

C. Sanitation, education, and isolation.

D. Surveillance, contact tracing, and isolation.

Answer: D

What is the primary mode of transmission for respiratory viruses like influenza and COVID-19?

A. Vector-borne transmission.

B. Foodborne transmission.

C. Airborne transmission.

D. Fecal-oral transmission.

Answer: C.

What are the basic principles of infection prevention and control?

A. Vaccination, treatment, and isolation.

B. Hand hygiene, personal protective equipment, and environmental cleaning.

C. Sanitation, education, and quarantine.

D. Surveillance, contact tracing, and isolation.

Answer: B.

What is the purpose of contact tracing in controlling infectious diseases?

A. To treat an ongoing infection.

B. To cure a disease.

C. To identify and monitor individuals who may have been exposed to a contagious disease and prevent further spread.

D. To prevent the occurrence of specific infectious diseases. Answer: C.

What is the role of public health measures in controlling infectious diseases?

A. To treat an ongoing infection.

B. To cure a disease.

C. To provide immunity to a different disease.

D. To prevent the occurrence of specific infectious diseases.

Answer: D.

What is the significance of antimicrobial resistance in the context of infectious diseases?

A. It can help in the treatment of infectious diseases.

B. It can prevent the occurrence of infectious diseases.

C. It can prolong the duration of infectious diseases.

D. It can lead to increased morbidity and mortality from infectious diseases.

Answer: D.

What is the role of surveillance in controlling infectious diseases?

A. To treat an ongoing infection.

B. To cure a disease.

C. To provide immunity to a different disease.

D. To monitor and track the occurrence and spread of infectious diseases

Answer : d

What does prevalence represent in epidemiology?

A. The number of new cases of a disease during a specific time period divided by the number of persons at risk for the disease during that same time period.

B. The proportion of people in a population having a disease.

C. The favorable surroundings and conditions external to the human or animal that cause or allow the disease or allow disease transmission.

D. The duration of the course of illness or condition. Answer: B. What is the purpose of knowing the prevalence of a specific disease in epidemiology?

A. To understand the demands on health services to manage the disease.

B. To determine the number of new cases per 1000 population.

C. To assess the interaction of various elements and factors in the environment and disease-related implications.

D. To break one of the legs of the epidemiology triangle.

Answer: A.

What is incidence in epidemiology?

A. The number of new cases of a disease during a specific time period divided by the number of persons at risk for the disease during that same time period.

B. The proportion of people in a population having a disease.

C. The favorable surroundings and conditions external to the human or animal that cause or allow the disease or allow disease transmission.

D. The duration of the course of illness or condition.

Answer: A.

What is the purpose of the epidemiology triangle in analyzing the outbreak of a disease?

A. To determine the effect of a disease on the host organism.

B. To identify the cause of the disease.

C. To assess the interaction of various elements and factors in the environment and disease-related implications.

D. To determine the duration of the course of illness or condition. Answer: C.

What is the mission of an epidemiologist in relation to the epidemiology triangle?

A. To identify the role of the host organism in disease transmission.

B. To determine the cause of the disease.

C. To break one of the legs of the triangle, disrupting the connection between environment, host, and agent, stopping the continuation of an outbreak.

D. To assess the prevalence of a specific disease in a population. Answer: C.

What does prevalence represent?

A. The number of new cases of a disease during a specific time period

B. The proportion of people in a population having a disease

C. The favorable surroundings and conditions external to the human or animal that cause or allow disease transmission

D. The duration of the course of illness or condition Answer: B.

What is incidence?

A. The number of new cases of a disease during a specific time period divided by the number of persons at risk for the disease during that same time period

B. The cause of the disease, such as bacteria, virus, parasite, fungus, or mold

C. An organism, usually human or animal, that harbors the disease

D. The favorable surroundings and conditions external to the human or animal that cause or allow disease transmission

Answer: A.

What is the purpose of the epidemiology triangle?

A. To analyze the role and interrelatedness of each of the four factors in the epidemiology of infectious diseases

B. To determine the effect of a disease on the host, such as level of immunity, genetic make-up, state of health, and overall fitness

C. To identify the favorable surroundings and conditions external to the human or animal that cause or allow disease transmission

D. To assess the duration of the course of illness or condition

Answer: A.

What is the role of the agent in the epidemiology triangle?

A. It represents the favorable surroundings and conditions external to the human or animal that cause or allow disease transmission.

B. It is an organism, usually human or animal, that harbors the disease.

C. It is the cause of the disease, such as bacteria, virus, parasite, fungus, or mold.

D. It accounts for incubation periods, life expectancy of the host or pathogen, duration of the course of illness or condition.

Answer: C.

What is the goal of public health in relation to the epidemiology triangle?

A. To determine the effect of a disease on the host, such as level of immunity, genetic make-up, state of health, and overall fitness

B. To identify the favorable surroundings and conditions external to the human or animal that cause or allow disease transmission

C. To break one of the legs of the triangle, which disrupts the connection between environment, host, and agent, stopping the continuation of an outbreak

D. To assess the duration of the course of illness or condition Answer: C.

What are fomites?

A. Living carriers of disease

B. Inanimate objects that serve a role in disease transmission

C. Reservoirs of infectious organisms

D. Insects that transmit diseases

Answer: B.

Which of the following is an example of a vector?
A. Pencil
B. Pen
C. Door knob
D. Mosquito
Answer: D.
What are reservoirs?
A. Humans only

B. Animals onlyC. Plants and soils only

D. Humans, animals, plants, soils or inanimate organic matter in which infectious organisms live and multiply

Answer: D.

What is a zoonosis?

A. Transmission of disease through inanimate objects

B. Transmission of disease through direct physical contact

C. Transmission of disease from animals to humans

D. Transmission of disease through airborne particles

Answer: C.

Who was Mary Mallon?

A. A famous scientist who discovered disease transmission

B. A healthy carrier of typhoid fever in the United States

C. A famous doctor who treated infectious diseases

D. A renowned cook known for her culinary skills

Answer: B.

What is the mode of disease transmission through sneezing, coughing, or talking?

A. Direct transmission

B. Indirect transmission

C. Airborne transmission

D. Vehicle-borne transmission

Answer: C.

What is vehicle-borne transmission?

A. Transmission through direct physical contact

B. Transmission through inanimate objects

C. Transmission through vectors

D. Transmission through respiratory droplets Answer: B.

What is vector-borne transmission?

A. Transmission through direct physical contact

B. Transmission through inanimate objects

C. Transmission through airborne particles

D. Transmission through vectors

Answer: D..

What is the chain of transmission?

A. The process of disease leaving the host through a portal or exit and spreading to a new host

B. The process of disease transmission through inanimate objects

C. The process of disease transmission through airborne particles

D. The process of disease transmission through direct physical contact Answer: A.

How can the spread of disease be stopped?

A. By using pencils and pens instead of touching contaminated hands

B. By avoiding close association with the triangle of epidemiology

C. By breaking the chain of transmission

D. By avoiding contact with any inanimate objects

Answer: C.

fomites?

A. Insects that transmit diseases

B. Inanimate objects that serve as a role in disease transmission

C. Humans that harbor infectious organisms

D. Animals that spread diseases

Answer: B.

Which of the following is NOT an example of indirect transmission?

A. Sneezing

B. Coughing

C. Touching contaminated hands

D. Vector-borne transmission by a flea

Answer: C.

Who was Typhoid Mary Mallon?

A. The first person in the United States to be identified as a healthy carrier of typhoid fever

B. A famous doctor who discovered the Typhoid vaccine

C. A scientist who studied disease transmission through fomites

D. A patient who survived typhoid fever and developed immunity Answer: A.

What is herd immunity?

A. When a large portion of a community becomes immune to a disease

B. When a person has developed their own antibodies through a vaccine

C. When a mother passes on immunity to her unborn child

D. When a population has no resistance to infectious diseases Answer: A.

What is passive immunity?

A. When a person has developed their own antibodies through a vaccine

B. When a mother passes on immunity to her unborn child

C. When a person has recovered from a disease and developed protective antibodies

D. When a population has no resistance to infectious diseases

Answer: B.

What percentage of population vaccination is recommended by CDC to prevent epidemics?

A. 50%

B. 60%

C. 70%

D. 80%

Answer: D.

What is the mode of transmission where the pathogen is carried from the source to the host in air particles?

A. Direct transmission

B. Indirect transmission

C. Airborne transmission

D. Vector-borne transmission

Answer: C.

Which of the following is an example of a vector-borne transmission?

A. Sneezing

B. Touching contaminated hands

C. Eating contaminated food

D. A mosquito carrying a disease-causing organism

Answer: D.

What is the term used for an individual who has been exposed to a disease-causing organism but has not shown any symptoms?

A. Convalescent carrier

B. Incubatory carrier

C. Healthy carrier

D. Passive carrier

Answer: C.

What can stop the spread of disease?A. Chain of transmissionB. Herd immunityC. VaccinationD. All of the aboveAnswer: D.

What are the three levels of disease classification based on severity and duration?A. Acute, Subacute, ChronicB. Severe, Moderate, MildC. Short-term, Intermediate-term, Long-termD. Recoverable, Partially recoverable, Non-recoverable

Answer: A.

Which level of disease is relatively severe, of short duration, and often treatable?

- A. Acute
- B. Subacute
- C. Chronic
- D. Recoverable
- Answer: A.

Which level of disease has intermediate severity and duration, with some acute aspects but of longer duration and with a degree of severity that detracts from a complete state of health?

- A. Acute
- B. Subacute
- C. Chronic
- D. Partially recoverable Answer: B.

Allswel. D.

Which level of disease is less severe but of long and continuous duration, lasting over a long time period, if not a lifetime, and may not fully recover?

- A. Acute
- B. Subacute
- C. Chronic
- D. Non-recoverable

Answer: C.

Which level of disease may not fully recover and can worsen over time, but does not immediately threaten life and may be over the long term?

A. Acute

- B. Subacute
- C. Chronic
- D. Partially recoverable

Answer: C.

Which level of disease is usually treatable, and the patient either recovers or dies?

- A. Acute
- B. Subacute
- C. Chronic
- D. Recoverable
- Answer: A.

Which level of disease has some acute aspects but is of longer duration and expected to eventually heal? A. Acute

- B. Subacute
- C. Chronic

D. Recoverable

Answer: B.

Which level of disease is not immediately life-threatening, but may pose risks over the long term? A. Acute

B. Subacute

C. Chronic

D. Partially recoverable

Answer: C.

Which level of disease may not fully recover, and the disease can worsen over time?

A. Acute

- B. Subacute
- C. Chronic

D. Non-recoverable

Answer: C.

Which level of disease has some aspects of recovery, but may not fully recover?

- A. Acute
- B. Subacute C. Chronic
- D. Partially recoverable Answer: D.

Lecture 3

What are the three broad categories used by WHO to classify causes of death and disability?

a) Communicable disease, injuries, and cancer

b) Non-communicable diseases, communicable disease, and injuries

c) Maternal conditions, nutritional conditions, and cancer

d) Heart attacks, stroke, and accidents

Answer: b

What is the leading cause of death in developed countries?

a) Communicable disease

b) Non-communicable disease

c) Injuries

d) Maternal conditions

Answer: b

What is the leading cause of death in developing countries?a) Communicable diseaseb) Non-communicable diseasec) Injuriesd) Maternal conditions

Answer: a

Why is it important to know the reasons why people die?a) To assess the effectiveness of health systems and allocate resourcesb) To improve how people livec) To identify health problems and trendsd) All of the aboveAnswer: d

What has COVID-19 highlighted regarding the importance of data collection systems?

a) The need to invest in civil registration and vital statistics systems

b) The fragmentation in data collection systems in low-income countries

c) The importance of daily counting of deaths

d) All of the above

Answer: d

What percentage of global deaths in 2019 were accounted for by the top 10 causes of death?

a) 10%

b) 25%

c) 44%

d) 55%

Answer: d

What are the three broad topics associated with the top global causes of death?

a) Cardiovascular, respiratory, and neurological conditions

b) Infectious, respiratory, and maternal conditions

c) Cardiovascular, respiratory, and neonatal conditions

d) Cancer, respiratory, and neonatal conditions

Answer: c

What percentage of global deaths in 2019 were accounted for by all non-communicable diseases together?

a) 44%

b) 55%

c) 74%

d) 80%

Answer: c

What is the leading cause of death globally?a) Lower respiratory infectionsb) Strokec) Ischemic heart diseased) Chronic obstructive pulmonary diseaseAnswer: c

What is the 2nd leading cause of death globally?

a) Lower respiratory infections

b) Stroke

c) Ischemic heart disease

d) Chronic obstructive pulmonary disease

Answer: b

What is the 4th leading cause of death globally?

a) Lower respiratory infections

b) Stroke

c) Ischemic heart disease

d) Chronic obstructive pulmonary disease

Answer: a

How has the number of deaths from lower respiratory infections changed since 2000?

a) The number of deaths has gone up substantially

b) The number of deaths has remained the same

c) The number of deaths has gone down substantially

d) The number of deaths has fluctuated over the years Answer: c

What is the 5th leading cause of death globally?

a) Neonatal conditions

b) Chronic obstructive pulmonary disease

c) Lower respiratory infections

d) Stroke

Answer: a

How has the number of deaths from neonatal conditions changed since 2000?

a) The number of deaths has gone up substantially

b) The number of deaths has remained the same

c) The number of deaths has gone down substantially

d) The number of deaths has fluctuated over the years

Answer: c

What is the 6th leading cause of death globally?

a) Trachea, bronchus and lung cancers deaths

- b) Ischemic heart disease
- c) Chronic obstructive pulmonary disease

d) Stroke

Answer: a

What is the leading cause of death in low income countries?

- a) HIV/AIDS
- b) Malaria
- c) Neonatal conditions
- d) Lower respiratory infection

Answer: b

What is the leading cause of death in lower middle income countries?

- a) HIV/AIDS
- b) Stroke
- c) Neonatal conditions
- d) Ischemic heart disease

Answer: d

What is the leading cause of death in upper middle income countries?
a) Lower respiratory infections
b) Stroke
c) Ischemic heart disease
d) Chronic obstructive pulmonary disease
Answer: c

What is the leading cause of death in lower middle income countries?a) Ischemic heart diseaseb) Chronic obstructive pulmonary diseasec) Lower respiratory infectionsd) StrokeAnswer: a

What are the 3 top leading causes of death in Jordan for males in all ages?

- a) Stroke kidney diseases lower respiratory infections
- b) Diabetes mellitus Neonatal conditions stroke
- c) Road injury Ischemic heart disease lung cancer
- d) ischemic heart disease road injury stroke

Answer: d

What are the 3 top leading causes of death in Jordan for both sexes in all ages?

- a) Stroke kidney diseases lower respiratory infections
- b) Diabetes mellitus Neonatal conditions stroke
- c) Road injury Ischemic heart disease lung cancer
- d) ischemic heart disease stroke road injury

Answer: d

What are the 3 top leading causes of death in Jordan for females in all ages?

- a) Stroke kidney diseases lower respiratory infections
- b) ischemic heart disease stroke hypertensive heart disease
- c) Diabetes mellitus Neonatal conditions stroke
- d) Road injury Ischemic heart disease lung cancer

Answer: b

What are the 3 top leading causes of death in Jordan for both sexes aged 20 - 24?

- a) ischemic heart disease stroke hypertensive heart disease
- b) Road injury interpersonal violence self-harm
- c) Diabetes mellitus Neonatal conditions stroke
- d) Self-harm Road injury Ischemic heart disease

Answer: b

Lecture 4

What is COVID-19?A) A bacterial infectionB) An autoimmune diseaseC) An infectious disease caused by a virusAnswer: C

What is the primary way COVID-19 is transmitted?A) Through contaminated surfacesB) Through the airC) Through sexual contactAnswer: B

Which group of people are more likely to develop serious illness from COVID-19?A) ChildrenB) Young adultsC) Older people and those with underlying medical conditionsAnswer: C

Does smoking increase the severity of respiratory diseases like COVID-19? A) Yes B) No Answer: A

Are there any long-term effects of COVID-19? A) No, once you recover you're back to normal B) Yes, some people continue to experience symptoms like fatigue and respiratory issues Answer: B

Can COVID-19 be spread through airborne transmission? A) Yes, but it is much less common than through close contact B) No, it can only be spread through close contact Answer: A

What is the most common way COVID-19 is transmitted?A) Through contaminated surfacesB) Through the airC) Through sexual contactAnswer: B

Are smokers at a higher risk of developing severe COVID-19 outcomes and death? A) Yes B) No Answer: A What is the name of the virus that causes COVID-19? A) SARS-CoV-2 B) MERS-CoV C) SARS-CoV Answer: A

When did the WHO first learn of the new virus that causes COVID-19?A) December 31, 2020B) February 11, 2020C) March 21, 2023Answer: A

How does COVID-19 primarily spread between people?

a) Through contact with contaminated surfaces

b) Through contact with infected animals

c) Through respiratory droplets

d) Through ingestion of contaminated food or water

Answer: c

Is spread of COVID-19 through touching surfaces common?

a) Yes, it is the most common way the virus spreads

b) No, it is not thought to be a common way the virus spreads

c) It is unknown how common it is for the virus to spread through surfaces Answer: b

Can COVID-19 be passed through breastfeeding?

a) Yes, transmission of active COVID-19 through breast milk and breastfeeding has been detected
b) No, there is no evidence of transmission of active COVID-19 through breast milk and breastfeeding
c) Breastfeeding is not recommended for women with confirmed or suspected COVID-19
d) Breastfeeding is only recommended if the mother has received the COVID-19 vaccine

Answer: b

Can a person be re-infected with COVID-19? a) No, a person cannot be re-infected with COVID-19

b) Yes, but only if they were not previously vaccinated

c) Yes, and it can occur multiple times

d) Reinfection only occurs in people with weakened immune systems Answer: c

What test is most commonly used to detect an active COVID-19 infection?a) Antibody testb) PCR testc) Rapid antigen testd) CT scan

Answer: b

What do antibody tests detect?
a) Active COVID-19 infection
b) Viral proteins
c) Antibodies produced in response to an infection
d) Genetic material of the virus
Answer: c

How does COVID-19 primarily spread between people?a) Through contact with contaminated surfacesb) Through respiratory dropletsc) Through contact with animalsd) Through breastfeedingAnswer: b

How common is it for COVID-19 to spread through contact with contaminated surfaces? a) It is the most common way the virus spreads

b) It is not thought to be a common way the virus spreads

c) It is the only way the virus can spread

d) It is more common than spread through respiratory droplets Answer: b

Can COVID-19 be passed between people and animals?

a) No, the virus only spreads between humans

b) Yes, it can spread in both directions

c) It is not yet known if the virus can spread between people and animals

d) Animals can spread the virus to humans, but not the other way around Answer: b

Can COVID-19 be transmitted through breastfeeding? a) Yes, breastfeeding should be avoided to prevent transmission b) No, there is no risk of transmission through breast milk c) Only if the mother has tested positive for COVID-19 d) Only if the baby has tested positive for COVID-19 Answer: b)

What is reinfection with COVID-19?

a) When a person is infected with COVID-19 for the first time
b) When a person is infected with COVID-19 more than once
c) When a person is infected with a different strain of COVID-19
d) When a person is infected with COVID-19 after being vaccinated Answer: b

How long does protection against SARS-CoV-2 generally last after infection? a) A few weeks b) A few months c) A few years d) Indefinitely Answer: b What type of test is used to confirm an active COVID-19 infection?
a) Antibody test
b) PCR test
c) Rapid antigen test
d) Serological test
Answer: b

What is the primary difference between a molecular test and a rapid antigen test for COVID-19?
a) The type of sample collected
b) The speed of the results
c) The accuracy of the results
d) The ability to detect past infections
Answer: b

What type of test is used to detect past COVID-19 infections?a) Antibody testb) PCR testc) Rapid antigen testd) Serological testAnswer: a

Can antibody tests be used to diagnose an active COVID-19 infection?

a) Yes, antibody tests can detect the virus in the early stages of infection

b) No, antibody tests can only detect past infections

c) Only if the individual has symptoms of COVID-19

d) Only if the individual has been exposed to someone with COVID-19 Answer: b

What is the current status of treatments for COVID-19?

A. No treatments are currently available for COVID-19.

B. Scientists are working to find and develop treatments for COVID-19.

C. All COVID-19 treatments have been proven ineffective.

D. COVID-19 treatments are only available in certain countries. Answer: B

What is optimal supportive care for COVID-19 patients?

A. Treatment with antibiotics

B. Treatment with corticosteroids

C. Treatment with hydroxychloroquine

D. Treatment with oxygen and respiratory support

Answer: D

Which of the following treatments has been shown to be effective in reducing the length of time on a ventilator and saving lives of patients with severe and critical illness?

A. Remdesivir

B. Hydroxychloroquine

C. Lopinavir/ritonavir

D. Dexamethasone Answer: D

What do the results of the WHO's Solidarity Trial indicate about the effectiveness of certain regimens for treating COVID-19 among hospitalized patients?

A. They are all effective in reducing mortality.

B. They all have little or no effect on mortality or the in-hospital course of COVID-19.

C. Only remdesivir has been shown to be effective.

D. Hydroxychloroquine is the most effective treatment.

Answer: B

Are antibiotics effective in preventing or treating COVID-19?

A. Yes, antibiotics are effective in preventing and treating COVID-19.

B. No, antibiotics do not work against viruses and should not be used as a means of prevention or treatment of COVID-19.

C. Antibiotics are effective in preventing COVID-19 but not in treating it.

D. Antibiotics are effective in treating COVID-19 but not in preventing it.

Answer: B

What is the WHO's guidance on self-medication with antibiotics or other medicines for COVID-19?

A. It is recommended for prevention of COVID-19.

B. It is recommended for treatment of COVID-19.

C. It is not recommended for prevention or treatment of COVID-19.

D. It is only recommended for people over the age of 60.

Answer: C

What is the purpose of wearing masks in the context of COVID-19?

A. To make it easier to breathe

B. To prevent the spread of bacteria

C. To prevent the spread of viruses

D. To provide protection against the common cold

Answer: C

Who should wear medical masks according to the WHO's guidance?

A. Only health workers in clinical settings

B. Only people who have tested positive for COVID-19

C. Only people over the age of 60

D. Health workers, people who are feeling unwell, anyone awaiting COVID-19 test results or who has tested positive, and people caring for someone who is a suspected or confirmed case of COVID-19 outside of health facilities.

Answer: D

Who should use non-medical, fabric masks according to the WHO's guidance?

A. People with underlying health conditions

B. People over the age of 60

C. The general public under the age of 60 and who do not have underlying health conditions

D. Only people who have been vaccinated against COVID-19 Answer: C According to the CDC, what is the best method for preventing the spread of germs and COVID-19?
a) Wearing gloves
b) Using hand sanitizers with 60% alcohol
c) Washing hands with soap and water
d) None of the above
Answer: c

What is the recommended minimum alcohol content for hand sanitizers to effectively prevent the spread of germs and COVID-19?

a) 20% b) 40% c) 50% d) 60% Answer: d

What is the purpose of wearing gloves in the context of preventing the spread of COVID-19? a) To protect yourself from getting infected b) To protect others from getting infected c) Both a) and b)

d) Neither a) nor b) Answer: c

When is it necessary to wear gloves?a) When using a shopping cartb) When caring for someone who is sickc) When running errandsd) Both a) and b)Answer: b

What is social distancing?

a) Keeping a safe space between yourself and other people who are not from your household
b) Avoiding touching your face with unwashed hands
c) Frequently washing your hands with soap and water for at least 20 seconds
d) None of the above
Answer: a

How far should you stay away from people who are not from your household when practicing social distancing?

- a) 2 feet b) 4 feet c) 6 feet
- d) 8 feet
- Answer: c

What is the difference between isolation and quarantine?
a) Isolation is for people who have been in contact with someone infected with COVID-19, while quarantine is for people who have tested positive for COVID-19.
b) Isolation is for people who have tested positive for COVID-19, while quarantine is for people who have tested positive for COVID-19, while quarantine is for people who have tested positive for COVID-19, while quarantine is for people who have tested positive for COVID-19, while quarantine is for people who have been in contact with someone infected with COVID-19.
c) Isolation and quarantine are the same thing.
d) Neither isolation nor quarantine are used for COVID-19.

What are the different types of COVID-19 vaccines in development?

a) Inactivated or weakened virus vaccines

b) Protein-based vaccines

c) Viral vector vaccines

d) RNA and DNA vaccines

e) All of the above

Answer: e

Which COVID-19 vaccine was the first to receive Emergency Use Listing (EUL) from the World Health Organization?

a) Pfizer/BioNTech Comirnaty vaccine

b) SII/Covishield and AstraZeneca/AZD1222 vaccines

c) Janssen/Ad26.COV 2.S vaccine

d) Moderna COVID-19 vaccine (mRNA 1273)

Answer: a

How many COVID-19 vaccines have obtained Emergency Use Listing as of 12 January 2022?

a) 3 b) 4

c) 5

d) 6

Answer: d

hat is the benefit of getting vaccinated against COVID-19?

a. It eliminates the risk of developing the disease.

b. It reduces the likelihood of infecting others.

c. It protects only the vaccinated person and not others.

d. Both A and B.

Answer: d

Can a COVID-19 vaccine cause the person to become sick with COVID-19?

a. Yes

b. No Answer: b. What are the possible side effects of COVID-19 vaccines? a. Headache b. Fever c. Diarrhoea d. All of the above Answer: d.

What should a person do if they experience severe or long-lasting side effects after getting vaccinated? a. Wait for the side effects to go away on their own.

b. Contact their healthcare provider for advice.

c. Take over-the-counter medication to manage the symptoms.

d. None of the above.

Answer: b..

Does having side effects mean that the vaccine is working?

a. Yes b. No

Answer: a.

Is it safe to receive two different COVID-19 vaccines for the first and second dose?

a. Yes

b. No

Answer: a.

What is virus evolution?

a. The process of a virus replicating or making copies of itself.

b. The process of a virus changing and selecting successful variants.

c. The process of a virus causing disease in a host.

d. None of the above.

Answer: b.

What are the characteristics that can change due to virus mutations?

a. Transmission

b. Severity of disease

c. Both A and B

d. None of the above

Answer: c..

Which of the following COVID-19 variants spreads more easily and quickly than other variants?

a. B.1.1.7 b. B.1.351 c. P.1 d. None of the above. Answer: a. What is the significance of the mutations in the P.1 variant of the COVID-19 virus?

a. They may affect the variant's ability to be recognized by antibodies.

b. They make the variant more severe than other variants.

c. They reduce the spread of the variant.

d. None of the above.

Answer: a.

What is the WHO's guidance on the use of micronutrient supplements as a treatment for COVID-19? a) They recommend using micronutrient supplements as a treatment for COVID-19

b) They have not provided any guidance on the use of micronutrient supplements as a treatment for COVID-19

c) They have advised against using micronutrient supplements as a treatment for COVID-19d) They have stopped the use of micronutrient supplements as a treatment for COVID-19Answer: b

What about the use of hydroxychloroquine for hospitalized COVID-19 patients? a) It has been found to reduce mortality of hospitalized COVID-19 patients b) It has been found to increase mortality of hospitalized COVID-19 patients c) Its use among seriously ill hospitalized patients was stopped in the WHO Solidarity Trial because data did not show that it reduces mortality of hospitalized COVID-19 patients d) Its use has been recommended by WHO as a treatment for COVID-19 Answer: c

Which of the following corticosteroids is recommended by WHO for severe and critically ill COVID-19 patients?

- a) Prednisolone b) Fluticasone
- c) Dexamethasone
- d) Triamcinolone
- Answer: c

Is it advisable to use corticosteroids for patients with non-severe COVID-19?"

a) Yes

b) No

Answer: b

Does the COVID-19 virus transmit through water or while swimming?

a) The virus transmits through water or while swimming

b) The virus does not transmit through water while swimming

c) The virus only transmits through water while swimming

d) The article does not provide any information on this Answer: b

What is the WHO's guidance on wearing medical masks for a prolonged time?
a) It may cause CO2 intoxication or oxygen deficiency
b) It does not cause CO2 intoxication or oxygen deficiency
c) It causes only CO2 intoxication
d) It causes only oxygen deficiency
Answer: b

Can thermal scanners detect people who are infected with COVID-19? a) Yes b) No Answer: b

What is the WHO's advice on using bleach or other disinfectants to protect against COVID-19?

a) It is advised to spray or introduce them into your body

b) It is advised to use them carefully to disinfect surfaces only

c) They should not be used at all

d) They should only be used for cleaning hands

Answer: b

اللهم أعني على الدراسة، وأبعد قلبي عن الملل منها، ووفقني يا رب لما تحب وترضى.

النادي الطلابي الكويتي في الأردن عمل الطالبة : إستبرق العسكري