1. What is the difference between communicable and chronic diseases?
2. What is morbidity?
3. What is mortality?
4. Why has the mortality rate increased over the past few decades?
5. Why have diseases increased over the past few decades?
6. What diseases have increased over the past few decades?
7. How are communicable diseases transmitted?
8. What are four methods of reducing the transmission of communicable diseases?

6.PCH.1 UNDERSTAND WELLNESS, DISEASE PREVENTION, AND RECOGNITION OF SYMPTOMS.

Essential Standard

EXPLAIN THE INCREASE OF INCIDENCE OF DISEASE AND MORTALITY OVER THE LAST DECADES

Clarifying Standard

- [Sneeze in Sleeve](#)
- In the early 1900's the leading causes of death in America were pneumonia, tuberculosis, and diarrhea, all communicable in nature.
- Today the three leading causes for death are heart disease, cancer, and stroke, which account for more than 50% of all American deaths each year.
- All of these are chronic diseases and many of these deaths are preventable.

CHRONIC VS. COMMUNICABLE DISEASE

Chronic Disease

- a long-lasting condition that can be controlled but not cured.
- Chronic diseases such as heart disease, cancer, and diabetes are the leading causes of death and disability in the United States.
- Chronic diseases are not contagious
- Are very costly and highly preventable
- Four chronic diseases that are not preventable and can affect young people are asthma, allergies, diabetes, and epilepsy.

Preventing Chronic Disease

- *Adopting healthy behaviors such as healthy eating, exercising regularly, and avoiding tobacco can prevent or control many chronic diseases.*

- The incidence of many chronic diseases can be decreased through healthy lifestyle decisions such as

  - consuming a healthy diet

  - remaining active throughout life.

Communicable Disease

- one that can be passed from one person to another
- Contagious
- Communicable diseases are infectious diseases caused by various types of microscopic organisms, including viruses, bacteria, parasites, and fungi.
- Most are preventable with simple interventions
- These organisms cause illnesses ranging from colds and flu to deadly diseases such as HIV/AIDS.
- The incidence of many communicable diseases can be decreased simply by washing hands properly and by sneezing into one's sleeve

Statement of Objectives:

- *Today we will learn which categories of diseases which are increasing in morbidity and mortality. You will learn about lifestyle behaviors that prevent disease and promote health. You will learn how important it is to examine the alternatives before you make a decision that could have negative effects on your health.*

Class Information

- Some diseases are increasing in incidence (happening more often) and some are decreasing (less often).
  - Examples:
    - Some cancers and Alzheimer's are increasing
  - Why?
    - people are living longer and dying of diseases that happen later in life.
- Some diseases such as high blood pressure are better controlled than they were in the past through medication.

- Exceptions to that general rule are "emerging infections" such as H1N1 virus, Ecoli, and West Nile virus.

- Various things determine the occurrence (how often it happens) and the increase/decline of diseases:
  - living conditions and sanitation
  - preventative measures such as immunization
  - accessibility to medical treatment
  - heredity

Main Idea

- What do you think happens more?
  - Chronic or communicable?
- For the most part, chronic diseases are increasing and communicable diseases are decreasing.

- **Morbidity** is the prevalence of disease within a population.
- **Disease incidence** is the number of new cases within a given time disease prevalence refers to the number of cases at any point in time.
- **Mortality** is the number of deaths within a population.
  - Mortality is often reported as age-specific (such as infant mortality) or cause specific (such as deaths from AIDS).

- Over the last decades, fewer Americans are dying of infectious (communicable) diseases and more die from chronic illness.

- Life expectancy can be improved by practicing primary prevention:
  - choosing health-enhancing lifestyle behaviors.
  - The most important lifestyle behaviors that significantly reduce the risks for illness and premature death) are
    - to avoid tobacco,
    - eat nutritiously and manage a healthy weight,
    - participate in regular fitness activities,
    - wear seatbelts and appropriate protective gear such as helmets,
    - avoid alcohol and other drugs,
    - avoid violent situations,
    - get help for depression and other mental disorders.
  - Making individual decisions about health behaviors positively or negatively affects health status more than heredity or environment.

Guided Practice:

- Divide students into pairs to work on a newspaper article using the website http://www. fodey.com. or create on white paper
- The article should include reasons why there is an increase of incidence of disease and mortality and explain preventive steps that could help in decreasing disease and mortality.
- Once articles have been written, students will share with class.

Independent Practice

- Each student should choose a personal health behavior that could be linked to a chronic disease that is preventable.
  - Diet, exercise, smoking, etc
- Use the Decision-Making Tree to see how you might arrive at a decision that would protect you.
- Examples include
  - what kind of drink to have after a soccer game (water soda, juice, a nutrition drink),
  - how to prepare for a big exam (go to bed on time, stay late the night before to study, start studying days ahead of the test).
- Students can share their decision trees with the class.
- An important aspect of this activity is helping students realize that they often have two or more alternatives and should consider as many positive and negative consequences as possible.
- For homework students should write paragraphs about three ways the decision tree helped them see their decisions in new ways (Appendix 2).

Decision-Making Tree

IDENTIFY THE DECISION THAT NEEDS TO BE MADE.

1. _____

GATHER RELEVANT INFORMATION FROM RELIABLE SOURCES.

2. _____

3. _____

CHOICE A	CHOICE B	CHOICE C

POSITIVE OUTCOMES OF CHOICE A	NEGATIVE OUTCOMES OF CHOICE A	POSITIVE OUTCOMES OF CHOICE B	NEGATIVE OUTCOMES OF CHOICE B	POSITIVE OUTCOMES OF CHOICE C	NEGATIVE OUTCOMES OF CHOICE C

4. _____ _____ _____   _____ _____ _____

WHO MIGHT BE AFFECTED BY MY CHOICE?

WHO IS INFLUENCING MY CHOICE?

5. _____

6. _____

ACT UPON MY CHOICE.

7. _____

Post - Test will be after the next lesson

Closure:

- *Today we learned that the incidence of death for communicable disease has decreased over the last decades and the number of deaths from the chronic diseases of heart disease, cancer, and stroke is now at an all-time high in our country. We learned that making good decisions on a daily basis is a key factor in reducing the incidence of mortality and morbidity from chronic and communicable diseases. From your decision making models, I can see that you will be able to make good decisions that can affect your health now and in the years to come.*