

## **APES – Review Book - Activity – CHAPTER 5**

**READ the Chapter 5 Review** and complete the following WS. Please study the summarized content to help you understand the **KEY Terminology** and the **KEY concepts**.

The responses are hand generated (in PEN). You don't need to print this document; you just need the lined paper to respond to the questions.

- I. Copy the **Key Terms** and define them all. Make sure to memorize the terms. *(There will be quiz on each Chapter Review)*
- II. Answer the **Comprehension Questions and/or Concept Topics**:

1. STUDY and IDENTIFY with the examples each category of the **Major Health Hazards**:

**A) biological hazard –**

- a) protist caused –
- b) bacteria caused –
- c) fungi caused -

**B) chemical hazard – focus on**

- a) heavy metals – lead, mercury
- b) PCBs
- c) phthalates
- d) asbestos
- e) BPA

**C) Physical hazards – focus on**

- a) natural disasters – wildfires, earthquakes, volcanic eruptions, floods, storms

**D) Cultural hazards – focus on**

- a) crime rate, working condition, etc

**E) Lifestyle hazards – focus on**

- a) health concern
- b) smoking, drugs
- c) unprotected sex

2. DEFINE and EXPLAIN **risk assessment and management**, memorize the phases:

- a) hazard identification**
- b) dose-response assessment**
- c) exposure assessment**
- d) risk characterization**

3. **Biological Hazard and Diseases – MEMORIZE** the Cause, symptoms, treatment/preventions, and data: Influenza, HIV, malaria, diarrheal, tuberculosis, hepatitis B, measles, SARS, West Nile disease, COVID 19.

- A) **DEFINE** each above listed disease
- B) **DEFINE – epidemic, pandemic, non-transmissible and infectious disease**

**C) READ AP Tip and SUMMARIZE!**

4. **DEFINE and Explain the Chemical Hazards – identify toxicology and persistence** of the drugs and chemical compounds

A) **DEFINE: biomagnification and bioaccumulation**

B) **DRAW** a food chain showing **trophic levels**, use RED for biomagnification and BLUE for bioaccumulation to show HOW it travels through the trophic levels

C) **SUMMARIZE** all: dose-response curve, acute effect and chronic effect, median lethal dosage, non-threshold and threshold dose- response

D) **REMEMBER: a response** is any **NEGATIVE** health effect from the material/chemical

**5. Types of Chemical Hazards:**

A) **DEFINE** and give three examples: carcinogens

B) **DEFINE** and give three examples: mutagens

C) **DEFINE** and give three examples: teratogens

6. The chemical hazard materials impact three human systems – immune system, nervous, and endocrine system.

A) **STUDY and MEMORIZE** chart on pg. 171 and 1172

B) **STUDY and REMEMBER** the Case Study: Bhopal India

7. List at the legislation and regulations for chemical toxins:

8. **DEFINE and EXPLAIN the Cultural and Lifestyle Hazards:** here make sure to study the diagram of the house, choose ten sources of the chemical compounds that are source of cultural and lifestyle risks. **LIST all the compounds you picked.**