Physical Education and Health

Learner’s Material

Health
Unit 1: Community and Environmental Health

This instructional material was collaboratively developed and reviewed by educators from public and private schools, colleges, and/or universities. We encourage teachers and other education stakeholders to email their feedback, comments, and recommendations to the Department of Education at action@deped.gov.ph.

We value your feedback and recommendations.
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HEALTH

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UNIT I

COMMUNITY AND ENVIRONMENTAL HEALTH

INTRODUCTION

A healthy community reflects a sense of well being. It is the foundation for achieving all other goals and is essential for a productive society. Thus, it also helps in building our country’s economy and in equipping our students to be healthier in order to learn and succeed academically.

In this module you will encounter social issues and problems involving the threats of community and environmental destruction. You will be encouraged to get involved in programs advocating community and environmental health. As a student, you can take part in maintaining and promoting a healthful community and environment. This module is designed for you to reflect on how healthy your community and environment are, what activities that adversely affect them and what you should do to sustain community and environmental health.

In the first part of this material, you are given an overview of the unit and concepts you will take up and the things they are expected to do.

In the pre-assessment, you will be asked to recall what you had learned from meaningful experiences of your life relevant to environmental destruction.

The varied competencies shall be your guide on what you are expected to accomplish in this module.

These modules will discuss four (4) lessons, which are categorically divided into four parts: What to Know, What to Process, What to Understand and What to Transfer.

LEARNING COMPETENCIES

At the end of this unit, the learners should be able to:

1. Explain the concept of community health
2. Describe the characteristics of a healthy community
3. Recognize the benefits of a healthy environment
4. Identify the most pressing environmental problems in the Philippines
5. Analyze the impact of environmental problems on people’s health
6. Apply community development and program planning skills to create effective and culturally relevant communication strategies and interventions to promote health

7. Make decisions about buildings, businesses, services, housing areas, and other structures to include in the environment of a healthy dream community

**PRE-ASSESSMENT**

Choose the best answer from the options below. Write the letter on the space provided before each number.

_______1. Which best describes a community health program?
   A. It maintains, protects and improves the health of all members of the community through organized and sustained community efforts.
   B. It maintains and improves the health of all members of the community through organized and sustained community efforts.
   C. It protects and improves the health of all members of the community through organized and sustained community efforts.
   D. It maintains, protects, and improves the health of all members of the community.

_______2. Which does not describe a healthy community?
   A. A clean and safe environment
   B. An environment that meets everyone’s basic needs
   C. An environment that promotes social harmony and actively involves everyone
   D. An environment that is fully aware of its daily opportunities.

_______3. Which best describes the benefits of a healthy environment?
   A. Less disease, less health care costs
   B. Active community involvement
   C. More budget for health problems, increased supply of medicines
   D. More community projects for community development
4. Which of the following problems is a leading cause of environmental destruction?
   A. Soil Erosion  
   B. Oil Spill  
   C. Illegal Mining  
   D. Deforestation

5. What environmental problem reduces the ability of soil to store water and support plant growth?
   A. Soil Erosion  
   B. Oil Spill  
   C. Illegal Mining  
   D. Deforestation

6. What environmental problem does this picture depict?
   A. Water pollution  
   B. Deforestation  
   C. Improper waste disposal  
   D. Flashfloods

7. Which is not an effect of Climate Change?
   A. Dead trees from oil spillage  
   B. Increased risk of drought, fire and floods  
   C. More health related illness and disease  
   D. Economic losses

8. Which of the following environmental problems causes Climate Change?
   A. Oil Spill  
   B. Deforestation  
   C. Pollution  
   D. Flashfloods

9. Which of the following programs of the Department of Health promotes community health?
   A. Maternal Health  
   B. Primary Health Care  
   C. Child Health Care  
   D. Control of Communicable Diseases
10. Why do we need to ensure community health in planning for community development?

A. To attain luxury of life
B. To keep the safety of the community
C. To live in a clean, safe, and comfortable home
D. To maintain an enjoyable lifestyle
LESSON 1

THE CONCEPTS OF COMMUNITY AND ENVIRONMENTAL HEALTH

OBJECTIVES

At the end of the lesson, the learners should be able to:

• explain the concept of community health and environmental health
• describe the characteristics of a healthy community

WHAT TO KNOW

This unit will introduce you to the concepts of a community and environmental health, to make you be aware of the importance of having a healthy community. You will be asked to participate in a series of activities involving health programs in your community.

Activity 1: VENN DIAGRAM

List down the different characteristics of your ideal/dream and existing community in the diagram. In the space where the two circles meet, write their similar characteristics.
Processing Questions:
1. Why is your community not an ideal one? Explain.
2. What characteristics would you like to have in your community?
3. How can you make your community an ideal one?

Activity 2. WORD REMOVAL

Look at the word chart at the bottom of the page. Follow instructions 1 to 5 below. Cross out words that consist of five or less letters.

When you are finished, you will find a message in the chart.
1. Cross out all the words that begin with letter S.
2. Cross out contractions (for example, can’t).
3. Cross out words that consist of ten or more letters.
4. Cross out all words that consist of letter O in column 2.

<table>
<thead>
<tr>
<th>OIL</th>
<th>DOESN’T</th>
<th>CORALS</th>
</tr>
</thead>
<tbody>
<tr>
<td>THE</td>
<td>HEALTH</td>
<td>ABOUT</td>
</tr>
<tr>
<td>AIR</td>
<td>ACID</td>
<td>DON’T</td>
</tr>
<tr>
<td>SMOG</td>
<td>THROW</td>
<td>PREVENTION</td>
</tr>
<tr>
<td>NONE</td>
<td>RED</td>
<td>THROW</td>
</tr>
<tr>
<td>NOISE</td>
<td>CORALS</td>
<td>POLLUTION</td>
</tr>
<tr>
<td>WON’T</td>
<td>SICK</td>
<td>ENVIRONMENT</td>
</tr>
<tr>
<td>FLASH FLOODS</td>
<td>FOSSILS</td>
<td>DEFORESTATION</td>
</tr>
<tr>
<td>FOG</td>
<td>AND</td>
<td>SMOKING</td>
</tr>
<tr>
<td>COMMUNITY</td>
<td>SMOKE</td>
<td>ADVOCATE</td>
</tr>
</tbody>
</table>

The message reads: _______________

Processing Questions:
1. What does the message tell us? Explain your answer.
2. Is acquiring health in the community relevant? Why?

The message has already been revealed, and you have discussed the relevance of health. But what does the word HEALTH mean? What is Community? What is the definition of Community Health? Let us look at more concepts.
This is what you need to know:

According to the World Health Organization, **Health** is a state of complete physical, mental, and social well-being and not just the absence of disease or infirmity. It leads to a socially and economically productive life.”

**Community** is defined as a sociological group in a large place sharing one environment. It therefore includes the individual and the family.

**Community Health** is defined as the art and science of maintaining, protecting and improving the health of all the members of the community through organized and sustained community efforts.

**Environmental Health** comprises those aspects of human health that are determined by physical, chemical, biological, social and psychosocial factors in the surrounding environment.

According to the World Health Organization (2002), the characteristics of a healthy community include:

1. A clean and safe physical environment
2. An environment that meets everyone’s basic needs
3. An environment that promotes social harmony and actively involves everyone
4. An understanding of local health and environment issues
5. A community that participates in identifying local solutions to local problems
6. A community whose members have access to varied experiences, means of interaction and communication
7. Accessible and appropriate health services and facilities
8. The promotion and celebration of historical and cultural heritage
9. A diverse and innovative economy
10. A sustainable use of available resources for all

You have now encountered concepts of community and environmental health. Share what you have understood. Write on the board at least 3 keywords that expresses what you have learned.

And read more!
Our government believes that a strong nation needs healthy citizenry. In order to achieve this, the Department of Health promoted community health with the partnership of community, barangay, government, and non-governmental organizations through the program called *Primary Health Care*.

**Primary Health Care Programs in the Community**

<table>
<thead>
<tr>
<th>Health Center Services</th>
<th>Functions</th>
</tr>
</thead>
<tbody>
<tr>
<td>Maternal Health Care</td>
<td>Pre-natal, Natal, Post-natal</td>
</tr>
<tr>
<td>Child Health Care</td>
<td>Immunizations, Control of diarrheal diseases</td>
</tr>
<tr>
<td>Nutrition Program</td>
<td>Operation Timbang, Food Supplementation</td>
</tr>
<tr>
<td>Population and Family Planning Program</td>
<td>Free Family planning</td>
</tr>
<tr>
<td>Control of communicable diseases</td>
<td>Tuberculosis control program</td>
</tr>
<tr>
<td>Environmental Sanitation program</td>
<td>Inspection of food establishments</td>
</tr>
<tr>
<td>Control on non-communicable diseases</td>
<td>Blood Pressure screening</td>
</tr>
<tr>
<td>Dental Health Program</td>
<td>Tooth Extraction</td>
</tr>
<tr>
<td>Reproductive Health Care</td>
<td>Counseling on family planning and RH</td>
</tr>
<tr>
<td>Medical Morbidity clinic</td>
<td>Provision of free medicines</td>
</tr>
<tr>
<td>National Voluntary Blood Services</td>
<td>Blood-letting activities at barangay level</td>
</tr>
<tr>
<td>Epidemiology and Surveillance program</td>
<td>Controlling outbreaks like Dengue</td>
</tr>
<tr>
<td>Disaster Management preparedness Program</td>
<td>Medical Services/assistance during disaster</td>
</tr>
<tr>
<td>Mental Hygiene</td>
<td>Adolescent counseling centers</td>
</tr>
<tr>
<td>Pharmacy Services</td>
<td>Distribution of medicines to all health centers</td>
</tr>
</tbody>
</table>

Did you know that the above services must be made available for **free** in your community because they are subsidized by the government to ensure that your health is being protected? **Yes, they are available and must be given for free**
Activity 3: THE HEALTH EXPERT

You are presently working at the World Health Organization as a Health Expert. A number of students will interview you about community and environmental health. Here are some of the questions that you will be asked. Write your response to each question on the space provided.

1. How do you assess if your community is healthy? What are the characteristics of a healthy community?
2. What are some of the benefits that we can enjoy with a healthy community?
3. How do we maintain, protect, and preserve health amidst the rising development of our community?

Activity 4: PRIORITY EXPRESS

This activity will ask you to set your priorities in promoting a healthier life inside a more developed and advanced community. There are two options given in each of the category. Mark (1) if the option is your first priority. Mark (2) if second. You can add options on the space provided.

1. I want to get around in my community by:
   - Riding a bike
   - Driving an automobile
   Others:
2. I want to have foods from:
   - Community gardens
   - Convenience/grocery stores
   Others:
3. I want to actively play in games by:
   - Parks/open spaces/town plaza
   - Online games
   Others:
4. I want to have more chances to get to know my neighbors through:

- Social Networking
- Active membership in youth organization

Others:

5. I want to live in a clean environment by:

- Reducing the amount of refuse
- Campaigning for a clean and green community

Others:

**Activity 5. WHAT MATTERS TO YOU?**

Given the examples below, what could be your top concern among priority issues in the community? Write down your top priority at the base and your last priority on top of the pyramid.

![Pyramid diagram]

**Examples of Community Issues and Concerns**

<table>
<thead>
<tr>
<th>Adult and childhood obesity</th>
</tr>
</thead>
<tbody>
<tr>
<td>Onset of sedentary diseases like heart disease, high blood pressure and diabetes</td>
</tr>
<tr>
<td>Air Pollution</td>
</tr>
<tr>
<td>Traffic Injuries</td>
</tr>
</tbody>
</table>
Processing Questions:
1. Tell your classmate about your top and least priority.
2. Explain your reasons for choosing your top and least priority issues.

WHAT TO UNDERSTAND

Activity 6: Inspect – Retrospect

Inspect the health services offered to your neighborhood. The left column lists characteristics of a healthy community. On the right column, fill in the service or programs in your community which fulfill the healthy community, characteristics in the left column. An example is provided.

<table>
<thead>
<tr>
<th>Characteristics of a Healthy Community</th>
<th>Possible Services observed from your community</th>
</tr>
</thead>
<tbody>
<tr>
<td>A clean and safe physical environment</td>
<td>Fogging, cleaning the drainage, improved street lighting</td>
</tr>
<tr>
<td>An environment that meets everyone’s basic needs</td>
<td></td>
</tr>
<tr>
<td>An environment that promotes social harmony and actively involves everyone</td>
<td></td>
</tr>
<tr>
<td>An understanding of local health and environment issues</td>
<td></td>
</tr>
<tr>
<td>A community that participates in identifying local solutions to local problems</td>
<td></td>
</tr>
<tr>
<td>A community whose members have access to varied experiences, means of interaction and communication</td>
<td></td>
</tr>
<tr>
<td>Accessible and appropriate health services and facilities</td>
<td></td>
</tr>
<tr>
<td>The promotion and celebration of historical and cultural heritage</td>
<td></td>
</tr>
<tr>
<td>A diverse and innovative economy</td>
<td></td>
</tr>
<tr>
<td>A sustainable use of available resources for all</td>
<td></td>
</tr>
</tbody>
</table>
Processing Questions:
1. From your answers above, can you consider your community healthy? Why or Why not? Explain.
2. What services did you not observe in your community?
3. What programs can you do to acquire such services?

Activity 7: Community Health Team Profile

Put a check (✔) either in column 1 or 2. Write brief answers in columns 3 & 4.

<table>
<thead>
<tr>
<th>HEALTH TEAM</th>
<th>Present in the Community</th>
<th>Not present in the community</th>
<th>Quantity</th>
<th>Responsibilities</th>
</tr>
</thead>
<tbody>
<tr>
<td>Health Physician</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dentist</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Nurse</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Midwife</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Health Worker</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Traditional medical practitioners</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Sanitary Inspector</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Medical Technologist</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dietary Nutritionist</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Barangay Nutrition Scholar</td>
<td></td>
<td></td>
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<td></td>
</tr>
<tr>
<td>Barangay Health Councilor</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Barangay Tanod</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Processing Questions:
1. Who among the community health team are not present in your community?
2. What will you do about their absence?
3. How will you convince the members of your community to take part in community health services?
Activity 8: Miting de Avance (Group Activity)

Portray a scenario that usually happens during an election period. The scene is like a big campaign event before an election. Divide the class into 5 teams composed of 8 members. Each team will focus their campaign on the preservation, promotion and protection of community and environmental health. Use a placard to express your intention. Provide as many placards as you can. Be creative. Present your platforms to the class and prepare for an Open Forum.

Rubrics:

<table>
<thead>
<tr>
<th>Rubrics</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
</tr>
</thead>
<tbody>
<tr>
<td>Relevance of the Message</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Creativity</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Delivery</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Crowd Control</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Activity 9: Speech-Perfect

If you were given a chance to become Mother Earth for a day, and you were asked to give a 30-minute talk to address your sentiments to the people, what would be the content of your message?

Guide Questions:
1. What are the problems of Mother Earth?
2. How can Mother Earth address her sentiments to the people?
3. How can she regain strength to reshape her condition amidst the threats she is suffering nowadays?
LESSON 2

COMMUNITY HEALTH PROBLEMS

OBJECTIVES

At the end of the lesson, the learners should be able to:

• Enumerate the different community health problems
• Recognize the value produced by a healthy environment

WHAT TO KNOW

Community health problems are common nowadays with the rise in modern technology; people neglect the importance of the basic need for safety. A safe environment will ensure quality of life that will lead to more productive citizen of the country. This lesson will help you understand that one environment is threatened by human activities and that you have a role in wiping out community health problems.

Activity 10: ALPHABET SOUP

There are 23 empty boxes in the middle of the chart on the next page. Write the missing letter in column 11 to complete the words. The letter you may add maybe from the beginning, middle or end of the word. All the words are related to community problems.
What words did you find? Use those words to create a meaningful paragraph or statement to awaken mankind to the problems of the environment.

Activity 11: CODE-DECODE

Mother Earth has given you a piece of paper with a code written on it. You are curious about it! She said: “It is the gift of rhyme that I can share with you.” You need to break the code to reveal these wise words. Here is the only clue that I can give you: Z=A
What is the coded message?

Processing Questions:
1. What does the message convey?
2. According to Mother Earth, the rhyme is a gift. Do you believe her? Explain your answer.
3. If you were Mother Earth, what could be your gift of rhyme to human kind?

The message that you have revealed will surely excites you to work on with your activities. Let’s get started and discuss the Community Health Problems.

PERENNIAL COMMUNITY HEALTH PROBLEMS
Different perennial problems happen to the different regions of the country.

They vary according to factors like: economy, politics, geography, culture and social context. There are places which experience community health problems like:

- water-borne and communicable diseases
- armed conflicts
- natural disasters
- highly urbanized zones
In this regard, the government has created an office which would be in charge of planning and implementing rules and regulations to address the above-mentioned community health problems. One of its programs is Solid Waste Management Program that helps lessen the amount of refuse in our country. Let’s take a deeper look at its focus of concern.

*Refuse are the dump, food waste or discarded materials.*

Refuse Materials by kind, composition and sources

<table>
<thead>
<tr>
<th>KIND</th>
<th>COMPOSITION</th>
<th>SOURCES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Garbage</td>
<td>Waste from preparation, cooking and serving of food, market wastes,</td>
<td>Households, restaurants, institutions, stores, markets</td>
</tr>
<tr>
<td></td>
<td>wastes from handling, storage and sale of produce</td>
<td></td>
</tr>
<tr>
<td>Rubbish</td>
<td>Combustible: paper, cartons, boxes, barrels, wood, excelsior, tree branches,</td>
<td>Same as garbage</td>
</tr>
<tr>
<td></td>
<td>yard trimmings, wood furniture, bedding, dunnage</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Non-combustible: metals, tin cans, metal furniture, dirt, glass, crockery,</td>
<td></td>
</tr>
<tr>
<td></td>
<td>minerals</td>
<td></td>
</tr>
<tr>
<td>Ashes</td>
<td>Residue from fires used for cooking and heating and from on-site incineration</td>
<td>Same as garbage</td>
</tr>
<tr>
<td>Street Refuse</td>
<td>Sweepings, dirt, leaves, catch-basin dirt, contents of litter receptacles</td>
<td>Streets, sidewalks, alleys, vacant lots</td>
</tr>
<tr>
<td>Dead Animals</td>
<td>Cats, dogs, horses, cows</td>
<td>Same as street refuse</td>
</tr>
<tr>
<td>Abandoned Vehicles</td>
<td>Unwanted cars and trucks left on public property</td>
<td>Same as street refuse</td>
</tr>
</tbody>
</table>
### Community and Environmental Health

<table>
<thead>
<tr>
<th>Category</th>
<th>Description</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Industrial wastes</td>
<td>Food-processing wastes, boiler house cinders, lumber scraps, metal scraps, shavings</td>
<td></td>
</tr>
<tr>
<td>Demolition wastes</td>
<td>Lumber, pipes, bricks, masonry, and other construction materials from razed buildings and other structures</td>
<td></td>
</tr>
<tr>
<td>Construction Wastes</td>
<td>Scrap lumber, pipes, other construction materials</td>
<td></td>
</tr>
<tr>
<td>Special Wastes</td>
<td>Hazardous solids and liquids: explosives, pathological wastes, radioactive materials, batteries</td>
<td></td>
</tr>
<tr>
<td>Sewage treatment residue</td>
<td>Solids from coarse screening and from grit chambers; septic-tank sludge</td>
<td></td>
</tr>
</tbody>
</table>

---

Here's more for your memory bank!

- **Garbage** refers to leftover vegetables, animal, fish and other food materials from the kitchen and establishments.
- **Rubbish** are waste materials such as bottles, broken glass, tin cans, waste papers, discarded porcelain wares, pieces of metal and other wrapping materials.
- **Dead animals** are lifeless dogs, cats, rats, pigs, chicken and other animals which die from diseases or accidents.
- **Stable Manure** includes animal wastes from barns, stables or the like.
- **Street Night soil** consists of human waste, normally wrapped and thrown into sidewalks and streets. It also includes human waste from the pail system.
- **Yard Cuttings** are those leaves, branches, grass, and other similar materials made during cleaning of gardens and typhoon aftermaths.

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Waste Disposal is the proper disposal of a discarded or discharged material in accordance with local environmental guidelines or laws.

Solid Waste Management refers to the discipline associated with the:

- control of generation
- storage collection
- transfer and transport
- processing
- disposal of solid waste

The preceding definition of solid waste states in accordance with the best principles of:

- public health
- economics
- engineering
- conservation
- aesthetics
- public attitude

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**Solid Waste is composed of the following:**

| Compostable | Recyclables | Non-recyclable and Non-compostables | Special Waste-hazardous household waste i.e. syringes, body fluids |

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According to RA No. 9003, there are many ways to do Solid Waste Management. A highly recommended formula is to adopt the 3Rs of Ecological Waste Management: REDUCE, REUSE, AND RECYCLE.

In addition, let us refrain from doing what has been prohibited under the law. These include:

- Littering, throwing, dumping of waste materials in public places like roads, sidewalks, canals, esteros, parks and establishments
- Open burning of solid waste;
- Allowing the collection of non-segregated or unsorted waste;

Source: http://www.denr.gov.ph/
> Squatting in open dumps and landfills;
> Open dumping or burying of biodegradable and non-biodegradable materials in flood-prone areas;
> Unauthorized removal of recyclable materials intended for collection by authorized persons;
> Mixing of source-separated recyclable materials with other solid wastes in any vehicle, box, container or receptacle used in solid waste collection or disposal;
> Manufacture, distribution or use of non-environmentally acceptable packaging materials;
> Establishment or operation of open dumps; and
> Importation of consumer products packaged in non-environmentally acceptable materials.

**Activity 12: Catch and Match**

Column A lists the different kinds of refuse. Write down examples of these refuse. Choose from the box below.

<table>
<thead>
<tr>
<th>Kinds of Refuse</th>
<th>Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rubbish</td>
<td>Leftover food, Empty bottle, Dead dog, Residue from fires, Metal scraps</td>
</tr>
<tr>
<td>Sewage Treatment residue</td>
<td>Construction materials, Cigarette butts, Unwanted cars, Dead batteries,</td>
</tr>
<tr>
<td>Business wastes</td>
<td>Septic tank sludge</td>
</tr>
<tr>
<td>Abandoned Automobiles</td>
<td></td>
</tr>
<tr>
<td>Incinerator Residue</td>
<td></td>
</tr>
<tr>
<td>Garbage</td>
<td></td>
</tr>
<tr>
<td>Dead Animals</td>
<td></td>
</tr>
<tr>
<td>Street Sweepings</td>
<td></td>
</tr>
<tr>
<td>Special Waste</td>
<td></td>
</tr>
<tr>
<td>Demolition Materials</td>
<td></td>
</tr>
</tbody>
</table>
### Activity 13: Identify-Classify

Fill in the missing parts of the chart.

<table>
<thead>
<tr>
<th>Kinds of Solid Waste</th>
<th>Examples of Waste</th>
<th>Ways of Disposal</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tin cans</td>
<td></td>
<td>Composting</td>
</tr>
<tr>
<td>Used diapers</td>
<td></td>
<td>Sanitary Landfill</td>
</tr>
<tr>
<td>Used newspapers</td>
<td></td>
<td>Recycling</td>
</tr>
<tr>
<td>Garbage</td>
<td></td>
<td>Treatment Method</td>
</tr>
<tr>
<td>Rubbish</td>
<td></td>
<td>Treatment Method</td>
</tr>
<tr>
<td></td>
<td>Damaged Television</td>
<td></td>
</tr>
</tbody>
</table>

If you are done with this activity and have already found out the correct answers, copy the completed table in your notebook to feed your memory bank. You did a good job!

### WHAT TO PROCESS

### Activity 14: CIRCLE-RECALL

Recall the problems encountered in your community today. Write the worst problem in the outermost part of the circle. Write the least in the innermost part of the circle.
Activity 15: TELL ME WHY?

Lets us discuss your answers in the activity:
1. What did you answer in the outermost part of the circle? Why?
2. What was your answer in the innermost part of the circle? Why?

WHAT TO UNDERSTAND

As a student, you have a role in the promotion of a healthy environment especially in your household, school and community. This is your chance to help eradicate community problems by completing the following statements.

Activity 16: SENTENCE REFLECT

1. I will promote proper disposal of refuse in our household by............
2. I will promote proper disposal of refuse in our school by.................
3. I will promote proper disposal of refuse in our community by........

Activity 17: PICTURE ANALYSIS

Examine the picture below. Reflect on the possible community health problems that may arise from this scenario and enumerate their effects on your community.

Image credit: andresalvador.smugmug.com
A clean and safe environment is important in achieving a healthy community. Protecting the health of a community involves protecting the environment from health hazards. It is more costly for a community to treat rather than prevent disease. Children must be taught how pollution affects people’s lives. You can reach out to younger generations and help them to be aware of the proper disposal of waste to prevent pollution.

Activity 18: TEACH-REACH

How can you teach children or unaware individuals in your community the message of this poster? Form groups of 3 members. Prepare for an actual demonstration.

Activity 19: SONG IRONY

The song, “Anak ng Pasig” is a reminder to all Filipinos that we sometimes neglect our environment. People tend to satisfy their needs and wants at the expense of our habitat.

The activity Song Irony is based from the song, “Anak ng Pasig”. Compose the irony message of the song “Anak ng Pasig” using the same melody. Turn the negative lyrics into something positive.

Example: Tapon doon, tapon dito ➞ Reduce doon, Reuse dito
ANAK ng PASIG
Composed by: Ryan Cayabyab
Performed by: Smokey Mountain

Ako’y umusbong sa tabi ng Pasig
Nagisnan ang ilog na itim ang tubig
Lumaking paligid ng bundok na umuusok
Langhap na langhap ang amoy ng basurang bulok

Ita ng buhay ng anak ng Pasig
Pa-swimming swimming sa itim na tubig
Playground lang ang bundok ng basura mo
Musika’y ugon ng kotse at bangka n’yo

Anak ng Pasig naman kayo
Kalat doon, kalat dito
Natakpan na ang langit kong ito
Nilason din ang Ilog ko

Akala ko’y ganon talaga ang mundo
Hanggang nakakita ako ng lumang litrato
Di maniwalang Pasig din ang tinitignan ko
Kaibigan ano ang nangyari dito
(Anong nangyari? Anong nangyari?)

Anak ng Pasig naman kayo
Kalat doon, kalat dito
Natakpan na ang langit kong ito
Nilason din ang Ilog ko

Processing Questions:
1. What did you feel upon changing the lyrics from negative to positive?
2. What does your song convey?
LESSON 3

ENVIRONMENTAL PROBLEMS IN THE PHILIPPINES

OBJECTIVES

At the end of the lesson, the learners should be able to:

➣ describe the environmental problems in the Philippines
➣ analyze the impact of the environmental problems on people’s health

Activity 20: Memory Lane

Can you recall the typhoons that hit the different regions of the country in years or decades ago? Let’s go down memory lane...

Match the typhoons with the places they affected. Use arrows to connect them.

Typhoons:
1. Can we prevent typhoons from happening?
2. How can we prepare against this natural phenomenon?
3. How can you relate the effects of these phenomena from human activities?

WHAT TO KNOW

Natural Resources and Biodiversity explain why the Philippines is a rich country. Putting our home into the rare list of nations which have both a hotspot and mega diversity area for over 6000 plant species and also numerous animal species inhabited this area. However, despite—or perhaps because of— their richness and massive importance to the environment and humans as well, the forests face continuing destruction and possible extinction.
This lesson will make you aware of the most pressing problems of environment today and their effects on people’s health.

Let’s narrow them down:

The most pressing environmental problems in the Philippines today

DEFORESTATION is the destruction of big areas of forests.

*Losing our Forests—FAST*


- The Philippines is among the countries with the fastest loss of forest cover around the world.
- It ranks 4th among the world’s top 10 most threatened forest hotspots
- If the 157,400 ha per year rate of deforestation continues, our remaining forest cover will be wiped out in less than 40 years.
A FLASH FLOOD is a sudden flood of great volume, usually caused by a heavy rain.

Illegal logging is another factor believed to have contributed to the staggering death toll in the cities of Iligan and Cagayan de Oro during Sendong 2011. Many victims were swept away by huge logs that rolled down denuded mountains facing the two cities.

ILLEGAL MINING is defined as the extraction of valuable minerals or other geological materials from the earth from an ore body, lode, vein, seam, or reef, which forms the mineralized package of economic interest to the miner in the absence of land rights, mining license, exploration or mineral transportation permit or of any document that could legitimate the on-going operations.

Here’s for your memory bank:

The Mining Act of 1995 aimed to help the domestic mining industry regain its competitiveness by allowing companies (Contractors) to obtain an exploration permit for a specific area for up to four years.

The Philippines is one of the most highly mineralized countries in the world with a mineral wealth estimated at US$840 billion, of which most of the mineral reserves are still untapped.

Nickel takes the lead in H1 2013

*Mines and Geosciences Bureau, October 22, 2013*

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Source:

http://books.google.com.ph/books?id=nika34WTbE-wC&pg=FA98&dq=illegal+mining+act+in+the+philippines&hl=en&sa=X&ei=ajN7UoO2JYiMiQeipICgCQ&ved=0CDMQ6AEwAQ#v=onepage&q=illegal%20mining%20act%20in%20the%20philippines&f=false
SOIL EROSION happens when soil and rock are moved from one place to another by wind, water, and gravity.

Causes of Soil Erosion:

- Deforestation
- Building of Roads
- Agriculture
- Urbanization
- Mining
- from oil tankers with equipment faults
- from nature and human activities on land
- from water sports
- from drilling works carried out in the sea

CORAL REEF DEGRADATION is a significant problem throughout the world. It has been acknowledged that 27% of the world’s reefs have been affected. Gardener (2003) pointed out that:

- 11% has been completely lost
- 16% has been damaged

Coral reefs - are diverse underwater ecosystems built from calcium carbonate secreted by corals. Coral reefs can be categorized into the following coral cover estimate thru line intercept transect method:

1. Category 1 - Poor (coral reef with > 0 to 10% coral cover)
2. Category 2 - Fair (coral reef with > 11 to 30% coral cover)
3. Category 3 - Good (coral reef with > 31 to 50% coral cover)
4. Category 4 - Very Good (coral reef with > 51 to 75% coral cover)
5. Category 5 - Excellent (coral reef with > 76 to 100% coral cover)
POLLUTION means any alteration of the physical, chemical and biological properties of water, air and/or land resources

AIR POLLUTION means any alteration of the physical, chemical and biological properties of the atmospheric air

WATER POLLUTION means any alteration of the physical, chemical, biological, or radiological properties of a body of water resulting in the impairment of its purity or quality.

NOISE POLLUTION is the excessive sound that causes hearing loss, stress, fatigue, irritability, tension, headaches, and high blood pressure.

SOIL POLLUTION is chiefly caused by chemicals in pesticides, such as poisons that are used to kill agricultural pests like insects and herbicides that are used to get rid of weeds. Soil pollution results from:
- Unhealthy methods of soil management.
- Harmful irrigation methods.

**EFFECTS OF THE ENVIRONMENTAL PROBLEMS**

<table>
<thead>
<tr>
<th>Environmental Problems</th>
<th>EFFECTS</th>
</tr>
</thead>
<tbody>
<tr>
<td>Deforestation</td>
<td>Soil erosion Landslides \nGreenhouse effect Denuded upland \nSiling of rivers and dams \nDegraded watershed \nFlooding \nDestruction of corals along the coast</td>
</tr>
</tbody>
</table>
| Flash Floods | Causes of diseases such as Cholera and other water borne diseases  
Loss of life  
Contamination of drinking water  
Destruction of Sewage System  
Destruction of dams and destruction of levees |
|-------------|------------------------------------------------------------------|
| Soil Erosion | Unproductive use of farmland  
Difficulty in raising of livestock  
Siling of artificial lakes  
Loss of soil and vegetation which causes climate changes |
| Oil Spill    | Suffocation of marine mammals  
Death of trees from oil in roots |
| Coral Reef Degradation | Loss of edible reef fish  
Reduction of species diversity and richness  
Alteration in the size structure of target species |
| Illegal Mining | Water poisoning of all the living things in it  
Destruction of beautiful coral reefs  
Barenness of land |

Here’s what you need to know!

“Environmental Law: Pollution Control” is all about combating pollution in the Philippine setting.

The following are pertinent laws adhering to environmental safety and health protection:

P.D. 389 (P.D. 705) – The Forestry Reform Code
- codifies, updates and raises forestry laws in the country. It emphasizes the sustainable utilization of forest resources.

P.D. 704 – Preservation of optimum productivity of fishery resources through conservation and protection.

P.D. 1219 – Providing for the protection of coral ecosystems.

P.D. 1067 – Water Code of the Philippines
- adopts adequate measures to conserve and regulate the use of water in commercial, industrial and residential areas. It also provides other policy guidelines on water quality and management of water resources.

P.D. 463 – Amended the Mining Act of 1936. Requires all mining leaseholders to comply with Pollution Control Laws and regulations and provide for penalties for noncompliance.

P.D. 1251 – Imposes fines on tailings and mine wastes and the fund generated is
used to pay for the damages to land, agricultural crops, forests products, aquatic resources and infrastructures caused by pollution for mining operations.

P.D. 984 – The Pollution Control Law
P.D. 825 – Prohibits the improper disposal of garbage
P.D. 856 – Sanitation Code
- places the responsibility on the local government units for the solid waste management in their area of production.

R.A. 8749 – Philippine Clean Air Act of 1999 - provides for a comprehensive air pollution control policy.

WHAT TO PROCESS

To be able to find out something about the air we breathe, follow the simple instructions below

Activity 21: An Experiment: Snare that Air

Objective: Describe how polluted air is in different places

Materials needed:
1. white cartolina cut into ¼ size short bond paper
2. Pomade, hair gel, petroleum jelly, or shampoo
3. Plastic knife
4. Clothesline clip or string
5. Permanent marking pen (fine)
6. Masking tape
7. Hand lens (optional)

1. Do this activity on a dry day.
2. At the bottom of the white cartolina, with the use of the permanent marking pen, write where you will place the cartolina to trap air pollution. Write your name, grade and section.
3. Spread the pomade (or hair gel, petroleum jelly or shampoo) on the piece of white cartolina using the plastic knife. This piece of cartolina shall be your Air Snarer.
4. With the use of the clothesline clip or string, hang, tie or place your Air Snarer (card) in a place in the school, home, or neighborhood. Examples are busy roads, residential places, near buildings, in the kitchen, bedroom, classroom,
or on a tree, etc. You may have to request somebody to watch the card so that they will not be removed, touched or transferred. It's better if your Air Snarer is placed high enough so that it will not catch attention.

5. Observe your Air Snarer every day and write down your observations.
6. After one week, bring your Air Snarer to school.
7. Lay it on the table with the other Air Snarers.
8. If you have a hand lens, look at the Air Snarers and compare them. See if your can distinguish what kind of particulates are there.
9. Arrange the Air Snarers from the cleanest to the dirtiest.
10. Tape all the Air Snarers on the bulletin board, arranged also from cleanest to dirtiest.
11. Write your observations inside the table below by supplying answers to the questions given

<table>
<thead>
<tr>
<th>What did you observe from the experiment?</th>
<th>What did you expect?</th>
<th>What kind of particulates were trapped in the Air Snarers?</th>
<th>Which of the Air Snarers were the dirtiest?</th>
<th>What did you not expect?</th>
<th>What do you plan to do as a result of this activity?</th>
</tr>
</thead>
</table>

Activity 22: Experiment: Must Be Something in the Water

**Objective:** To identify pollutants in the water supply

**Materials needed:**
- Gauze or clean white cloth large enough to cover a faucet
- String
- Hand lens (optional)
- Cardboard
- Clear plastic

1. Choose a faucet in your house.
2. Cover the mouth of the faucet with gauze or a clean white cloth. Tie the cloth with the string to keep it from falling.
3. Remove the gauze every day and examine it through a hand lens. Record your observations in your notebook.
4. After one week, remove the gauze or cloth. Using your hand lens, examine the gauze or cloth for the last time.

5. Dry the cloth and tape it on cardboard. Cover it with plastic to preserve whatever has been caught in the cloth.

6. Bring the cloth to school.

7. Lay your cloth on the table. Compare your cloths.

Observation Sheet:

<table>
<thead>
<tr>
<th>What did you observe from the experiment?</th>
<th>What did you expect?</th>
<th>What kind of particulates were trapped in the cloth?</th>
<th>Which of the faucets yielded the cleanest and dirtiest?</th>
<th>What did you not expect?</th>
<th>What do you plan to do as a result of this activity?</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**WHAT TO UNDERSTAND**

You have already identified the different environmental issues and their effects on people’s health. Now, you have to sum up what you have learned.

**Activity 23: Sum it up!**

<table>
<thead>
<tr>
<th>Environmental Problems</th>
<th>Effects on the Environment</th>
<th>Effects on the People’s Health</th>
</tr>
</thead>
<tbody>
<tr>
<td>Deforestation</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Soil Erosion</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Air Pollution</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Water Pollution</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Flash Floods</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Oil Spill</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Coral Reef Degradation</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Illegal Mining</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Reflect:
1. What did you feel after doing the activity?
2. Who could be the possible victims of these environmental problems?
3. Do people still have the chance to restore what was lost in the environment?
4. After knowing the effects of these environmental problems, does our environment still have something to offer to humanity?
5. How can you explain the destruction of the environment to the young and innocent children?

Activity 24: Data Shows
Interpret the data given by writing a news report. On a piece of paper, present the information in detail and suggest intervention programs to improve the statistics shown. Present your report to class.

**Rubrics of Performance:**

<table>
<thead>
<tr>
<th>Rubric</th>
<th>4</th>
<th>3</th>
<th>2</th>
<th>1</th>
</tr>
</thead>
<tbody>
<tr>
<td>Comprehensive</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Informative</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Accuracy</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Delivery</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**WHAT TO TRANSFER**

Activity 25: Case Study (Group Activity)
A number of typhoons are featured below. Choose one and investigate the details of the tragedy it caused. Make a case study on the severity of the damage and find out its reasons. Show evidence of your research.
Activity 26: PAINT ME A PICTURE

Make a poster about the damage caused by typhoon YOLANDA in some parts of the Visayas Region.

Criteria:
- Creativity: 4 3 2 1
- Neatness of Work: 4 3 2 1
- Message: 4 3 2 1
- Interpretation: 4 3 2 1

Now, let’s evaluate what you can do to eradicate community and environmental health through action planning for community development.
LESSON 4
COMMUNITY HEALTH ACTION PROJECT IMPLEMENTATION

WHAT TO KNOW

As an aspiring young leader of your community, you need to know how to make action plans towards community development.

Here is what you need to know:

In this unit, you will be given the opportunity to design a program for community development and employ planning skills. Before this, you will be oriented on the possible ways to prevent community problems.

You will also be oriented on the existing remedial programs of your community.

OBJECTIVE

At the end of this lesson, the learners should be able to:

- Apply community development and program planning skills to create effective and culturally relevant communication strategies and interventions to promote health.
Recall the problems of your community. Which problem needs the most attention?

Activity 27: Think …

Have you already decided on an action plan appropriate to your problem?
Answer: ____________________

Processing Questions:
1. What made you choose this community problem?
2. Is it already a big challenge to your community? Why? How?

You must also know this:

Here’s another framework to consider in action planning. If you chose to focus your intervention program on Environmental Health, this is your guide. Choose one (1).
There are different agencies working together for community health. Their programs are also anchored on sustaining community development. Activities and programs for the community must be coordinated with the following agencies mentioned below for support and cooperation.

**DepEd**—Department of Education

**DND**—Department of National Defense

**DPWH**—Department of Public Works and Highways

**PIA**—Philippine Information Agency

**PopCom**—Population Commission

**DA**—Department of Agriculture

**DBM**—Department of Budget and Management

**PMA**—Philippine of Medical Association
PNRC—Philippine National Red Cross
DILG- Department of Interior and Local Government
NNC- National Nutrition Council
NEDA- National Economic and Development Authority
PHA- Philippine Hospital Association
DOH-Department of Health

These agencies have specific capacities to help. What the community needs is to tap and coordinate with them.

WHAT TO PROCESS

Choose a topic from the framework. Decide on the programs you would like to create. As you can see there are a number of agencies that you can anchor your programs on. Please follow the correct guidelines for making an action plan. To make your action plan easier, here is your guide. Simply fill it up!

Activity 28: My Action Plan

Environmental Problem: ________________________________

<table>
<thead>
<tr>
<th>Part A</th>
<th>Title/Problem</th>
<th>Goals</th>
<th>Action Steps</th>
<th>Benefits</th>
<th>Evaluation</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>What is the title of your study?</td>
<td>What do you want to happen?</td>
<td>How will it happen?</td>
<td>What positive outcomes do you expect?</td>
<td>How will you know when it is complete?</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>PART B</th>
<th>Assigned to:</th>
<th>Timeline</th>
<th>Resources Needed</th>
<th>Cost</th>
<th>Additional Community Contacts</th>
</tr>
</thead>
</table>
Processing Questions:
1. Have you already completed the table with your plan of action?
2. Among the given steps, what was the most difficult to answer? Why?

**WHAT TO UNDERSTAND**

Write down your plans of action and strategies.

**WHAT TO TRANSFER**

Start your action plan now. Conduct an interview with the people that will help you realize your plan of action.

Write down your schedule for actual data gathering on the table below.

**Activity 29: TIME FRAME**

<table>
<thead>
<tr>
<th>Time</th>
<th>Day</th>
<th>Action</th>
<th>Person Involved</th>
</tr>
</thead>
</table>
LESSON 5

PROJECT ASSESSMENT

OBJECTIVE

At the end of this lesson, you should be able to:

- Make decisions about buildings, businesses, services, housing areas, and other structure and act on the development of a healthy dream community

Activity 30: Canteen Survey

Visit your school canteen. Find out if the school canteen complies with the requirements on food sanitation.

A. CHECKLIST

<table>
<thead>
<tr>
<th>Health Requirements</th>
<th>YES</th>
<th>NO</th>
<th>REMARKS</th>
</tr>
</thead>
<tbody>
<tr>
<td>Presence of Health Certificates of Canteen Personnel</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Provision of enough clean water supply</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Presence of clean and safe kitchen, lavatory and comfort room</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Proper food preparation, food storage and food serving</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Proper lighting and ventilation</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Proper waste disposal</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Control of rodents, cockroaches, flies, pests, etc.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Availability of Drinking Water</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Ample water supply for handwashing

Regular water potability testing

Others

B.

1. Study the result of your survey.
2. How many items were complied with? Which items?
3. How many items were not complied with? Which items?
4. Write down your observations based on the survey.
5. Based on the result of your survey, what recommendations or suggestions can you give to improve and maintain the cleanliness and safety of the school canteen?

Suggested Activities:

1. Survey on the School’s Solid Waste Management Practice
2. Study on the Problems on the Drainage System of the Barangay
3. Promulgate Laws for Proper Waste Disposal
4. Initiate a Signature Campaign Against Illegal Mining and Coral Reef Degradation.

Your action plan will detail your involvement in protecting your environment. The safety of the community is the primary concern of the government, thus, the next lesson will introduce you to Injury Prevention, Safety and First Aid.

But before your excitement leads you to a more wonderful adventure, you are required to answer the summative test of this quarter.

Link to the nearest NGO’s and GO’s for the support of this program

Goodluck and Congratulations!
SUMMARY/SYNTHESIS

There are existing Philippine Laws that will protect our environment from external factors. To name a few: Philippine Clean Air Act, Philippine Water Act and Ecological Solid Waste Management Act. These laws are implemented to protect our environment.

In this module, you have learned the importance of having a healthy community, thus, leading to the safety of every individual. The concept of having an ideal community in the promotion of Environmental Health. There are dangers around if we continue to live threatening our surroundings. In fact, we have been embedded through series of natural phenomena. Damages are more obvious!

In this material, there are suggested activities that will guide a Grade 9 student to be actively participating in the programs of the government. By this, they can assess, even if in their own little way they can make a difference.

Most of the activities highlighted on this material are geared towards the awareness of every student that he/she has an individual share of responsibility.

The action plan will definitely help students to take a deeper understanding of their community by means of drawing strategic plans to improve the safety of every individual.

There are varied formative assessments designed on this module, anchored on the K to 12 curriculum, following the areas on KPUP. There are 4 major categories: What to know, What to Process, What to Understand and What to Transfer.

GLOSSARY

*Air Pollution* means any alteration of the physical, chemical and biological properties of the atmospheric air, or any discharge thereto of any liquid, gaseous or solid substances that will or is likely to create or to render the air resources of the country harmful, detrimental, or injurious to public health, safety or welfare or which will adversely affect their utilization for domestic, commercial, industrial, agricultural, recreational, or other legitimate purposes.

*Community* is defined as a sociological group in a large place sharing one environment. It therefore includes the individual and the family.

*Community Health* is defined as the art and science of maintaining, protecting and improving the health of all the members of the community through organized and sustained community efforts.

*Deforestation* is the destruction of big areas of our forests
Environmental Health comprises those aspects of human health that are determined by physical, chemical, biological, social and psychosocial factors in the surrounding environment.

Flash Floods is a sudden flood of great volume, usually caused by a heavy rain.

Garbage refers to leftover vegetables, animal and fish material food in kitchen and establishments.

Health is a state of complete physical, mental, and social well-being and not merely the absence of disease or infirmity, and the ability to lead a socially a

Illegal Mining is defined as the extraction of valuable minerals or other geological materials from the earth from an ore body, lode, vein, seam, or reef, which forms the mineralized package of economic interest to the miner in the absence of land rights, mining license, exploration or mineral transportation permit or of any document that could legitimate the on-going operations and economically productive life.”

Noise Pollution is the excessive sound that causes hearing loss, stress, fatigue, irritability, tension, headaches, and high blood pressures. Noise pollution also causes accidents by preventing people from concentrating on their present activities.

Primary Health Care an approached launched by the Department of Health in promoting community health through the partnership of the community, barangay, government organizations, and non-governmental organizations.

Pollution means any alteration of the physical, chemical and biological properties of any water, air and/or land resources of the Philippines, or any discharge thereto of any liquid, gaseous or solid wastes as will or is likely to create or to render such water, air and land resources harmful, detrimental or injurious to public health, safety or welfare or which will adversely affect their utilization for domestic, commercial, industrial, agricultural, recreational or other legitimate purposes.

Refuse are the dump, food waste or discarded materials.

Rubbish are waste materials such as bottles, broken glass, tin cans, waste papers, discarded porcelain wares, pieces of metal and other wrapping materials.

Soil Erosion—happens when soil and rock are moved from one place to another by wind, water, and gravity.

Soil Pollution is chiefly caused by chemicals in pesticides, such as poisons that are used to kill agricultural pests like insects and herbicides that are used to get rid of weeds.

Solid Waste Management shall refer to the discipline associated with the
control of generation, storage, collection, transfer and transport, processing, and disposal of solid waste in a manner that is in accord with the best principles of public health, economics, engineering, conservation, aesthetics, and other environmental considerations and that is also responsive to public attitude.

**Stable Manure** includes animal from barns, stables or the likes.

**Street Night soil** consists of human waste, normally wrapped and thrown into sidewalks and streets. It also includes human waste from the pail system.

**Waste Disposal** shall refer to the discharge, deposit, dumping, spilling, leaking, or placing, of any solid waste into or any land.

**Water Pollution** means any alteration of the physical, chemical, biological, or radiological properties of a water body resulting in the impairment of its purity or quality.

**Yard Cuttings** are those leaves, branches, grass, and other similar materials produced during cleaning of gardens and after typhoon.

**RESOURCES**

Books:


WEB SOURCES:


The American Heritage® Dictionary of the English Language, Fourth Edition


http://en.wikipedia.org/wiki/Flash_flood
http://www.cdc.gov/healthycommunitiesprogram/tools/change/downloads.htm
https://www.google.com.ph/?gws_rd=cr&ei=wGJWUtn1BcaFlAX-wtYGwAQ#q=rubrics+for+drawing
http://course1.winona.edu/shatfield/air/saskhealthplan.pdf
http://www.kalikasan.net/features/2011/06/05/where-are-trees-examining-state-philippine-forests
http://www.emb.gov.ph/embgovph/Portals/38/IEC/irr.PDF
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http://oilsplat.wordpress.com/about/
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