

Handicraft First Year

Module 5 Tools, Materials, Supplies and Accessories



What this module is about

How are you after the preceding module? Still okay? Are you familiar with the various tools, equipment, materials, supplies and accessories used in handicraft making? Well, if not, this module will help you familiarize with the different tools and equipment used in craft making. This module dwells also on the various supplies, materials and accessories used in handicraft products.

Have you seen anyone working in a handicraft shop? What did you notice? What tools does he use to do his tasks? How about the materials, supplies and accessories he uses? Do you want to know all these things? Good! Move on and enjoy reading.



What you are expected to learn

This module will help you do these:

1. identify the types and uses of hand tools and power tools used in handicraft;
2. describe the characteristics of various indigenous materials used in handicraft;
3. identify supplies and accessories used in handicraft; and
4. explain the process and treatment of handicraft materials.



How to learn from this module

1. Read and understand each lesson well.
2. Follow directions accurately.
3. Perform all the activities in each lesson.
4. Answer the self-check exercises honestly.
5. Answer the pretest and posttest before proceeding to Lesson 1. Then, answer the posttest later on after reading all the lessons in this module.



PRETEST

- I. Multiple Choice: Choose only the letter of the best answer in each number.
1. Any measuring tool marked with the English or metric systems of measurement.
 - a. chisel
 - b. ruler
 - c. sliding T-bevel
 - d. marking gauge

 2. It is sometimes called “the wooden hammer.”
 - a. mallet
 - b. hatchet
 - c. chisel
 - d. nail set

 3. It is a type of saw used to cut wood across its grain.
 - a. rip saw
 - b. back saw
 - c. cross-cut saw
 - d. coping saw

 4. It is a tool used in drawing lines, marking off points in measuring, lining fine construction materials and boring holes.
 - a. marking gauge
 - b. hatchet
 - c. nail set
 - d. scratch awl

 5. This material comes in varied colors and textures and is used in coin purses, bags or billfolds.
 - a. rattan
 - b. leather
 - c. fiber
 - d. bamboo

 6. It is an accessory used to enhance the appearance of a project.
 - a. ribbon
 - b. rope
 - c. wire
 - d. glue

 7. This handicraft material can be used in the construction of houses, furniture and other items.
 - a. rattan
 - b. fiber

- c. bamboo
 - d. coconut shell
8. It is a thread-like material extracted from mature plants.
 - a. fiber
 - b. coconut
 - c. shell
 - d. bamboo
 9. It is the process of applying color to materials.
 - a. bleaching
 - b. dyeing
 - c. preserving
 - d. treating
 10. It is the process of whitening or removing color through the sunlight.
 - a. preserving
 - b. treating
 - c. bleaching
 - d. dyeing

II. Jumbled Letters:
Form words from the jumbled letters listed below.

Clue: Supplies and accessories

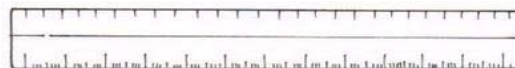
1. A I P T N
2. R P O E
3. I E W R
4. L G E U
5. T L G E I S R T

Lesson 1

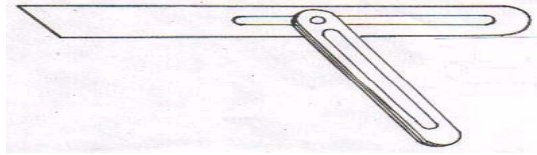
Common Hand Tools and Power Tools Used in Handicraft

Handtools and power tools are necessary in performing any handicraft project. Handtools are used to process materials by hand, while power tools are mechanical devices used to speed up function. Following are basic handicraft tools are used in industrial arts work.

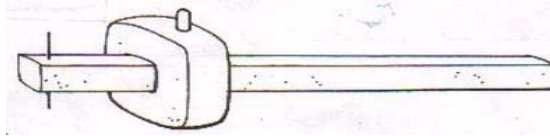
1. Ruler – a measuring tool marked with the English or metric system of measurement.



2. Tri-square – a tool used to test the squareness of a piece of stock. The blade is at a right angle with the handle. The T-square is measured by the length of its blade.



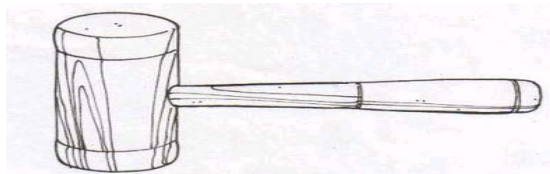
4. Marking gauge – used in marking parallel lines with a steel point or spur filed with a conical point or wedge shape.



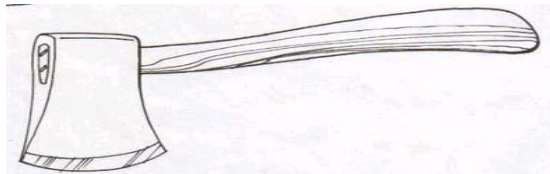
5. Scratch awl – a tool for drawing lines, marking off points in measuring, lining fine construction materials and boring holes.



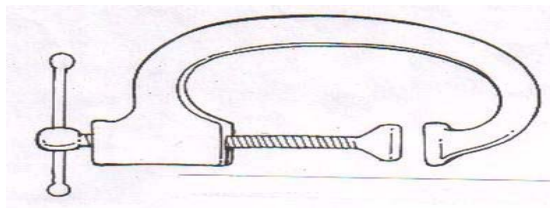
6. Mallet – sometimes called a wooden hammer and is made of hard wood and used in driving wood chisels.



7. Hatchet – a small, short-handed tool like an axe used with one hand for cutting or hammering.



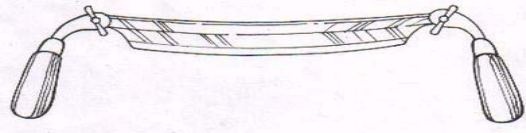
8. C-clamp – resembles the capital letter “C” and is used for holding small pieces of stock.



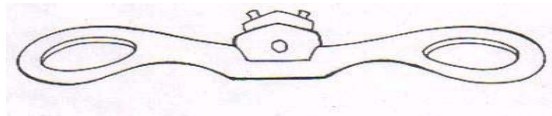
9. Nail set – a set of tools of different sizes and shapes used to drive the nails below the wood surface.



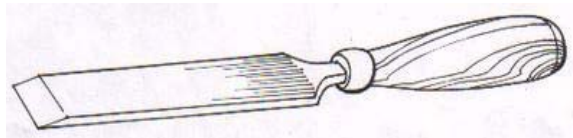
10. Draw knife – a tool with a blade about 10 to 12 inches 254.0 to 304.8 mm long, with a handle on each end and is used to remove a large amount of stock which is too thick for planing and too thin for shaving.



11. Spokeshave – a kind of double-handled plane used to smoothen irregular curves in woodwork.



12. Chisel – tool used to pare, gauge and engrave.



13. Cross cut-saw – a handsaw used in cutting wood across the grain.

14. Compass saw – a type of handsaw with a small tapering blade used to cut small circles and other shapes.

15. Width sizing – a tool used for sizing bamboo weavers and is driven on a piece of block with a desired angle cut.

16. Shader – a tool used for removing the outer skin or enamel coating of bamboo, and is used like a draw knife.

17. Tin snip – used to cut kapis shells and thin metal sheets.

18. Handrill – used to bore holes on shells and other objects.

19. Pliers – a tool used for wire cutting.

20. Blowtorch – a portable device for securing intense local heat which is used by plumbers, painters and persons working on rattan products.

Activity 1

Collect pictures of different tools used in craft making. Paste the pictures on a half of cartolina and label each. Present your work to the class and tell how each is used.



Self-check:

Match Column A with Column B by writing the letters of the correct answers in your notebook.

Column A

1. Tin snip
2. Marking gauge
3. Mallet
4. Handrill
5. C-clamp
6. Ruler
7. Pliers
8. T-square
9. Spokeshave
10. Blowtorch

Column B

- a. used in marking parallel lines
- b. measures lines
- c. "a wooden hammer"
- d. tests the squareness of stock
- e. used in cutting wire
- f. smoothens irregular curves
- g. secures intense local heat
- h. holds small pieces of stock
- i. used to bore holes
- j. cuts thin metal sheets

Did you set all the answers correct. If yes, very good! You can now move on to the next lesson.

Lesson 2

Materials and Their Uses

Bamboo, rattan, abaca by-products, and other indigenous materials are important components in craft making. Out of these materials, one can produce usable and marketable articles. These materials have different properties. Some are hard and brittle, soft and pliable, others are fine, coarse, elastic and colorful. Handicraft making requires different kinds of material to produce quality output.

For your guide, the table below shows various materials and their characteristics and uses. This will help you identify the specific project you want to make.

Material	Characteristics	Uses
bamboo	<ul style="list-style-type: none">• hard• sharp	<ul style="list-style-type: none">• house construction• furniture

	<ul style="list-style-type: none"> • curved spines 	<ul style="list-style-type: none"> • novelty items
rattan	<ul style="list-style-type: none"> • a vine that has a single stem • easily splinted 	<ul style="list-style-type: none"> • baskets, hats • caning the bottom of chairs • chairs and tables
leather	<ul style="list-style-type: none"> • comes in varied colors and textures 	<ul style="list-style-type: none"> • wallet • key holder • billfold • bag
coconut shell	<ul style="list-style-type: none"> • hard • brittle • durable 	<ul style="list-style-type: none"> • kitchen articles • coconut husk used for brushes, rugs, floor mats and doormats
seashell	<ul style="list-style-type: none"> • brittle 	<ul style="list-style-type: none"> • buttons • toilet articles • handles • fans • card cases
Kapis shell	<ul style="list-style-type: none"> • circular and flat 	<ul style="list-style-type: none"> • windows • decoration • lampshades
fiber	<ul style="list-style-type: none"> • thread-like; extracted from mature plants 	<ul style="list-style-type: none"> • brush • rope • doormats

Activity 2

Make a collection of local industrial materials available in your community. List down products/articles that can be made out of these materials.



Self-check:

Fill-up the table with the correct information on the given material.

Material	Characteristics	Uses
fiber		
bamboo		

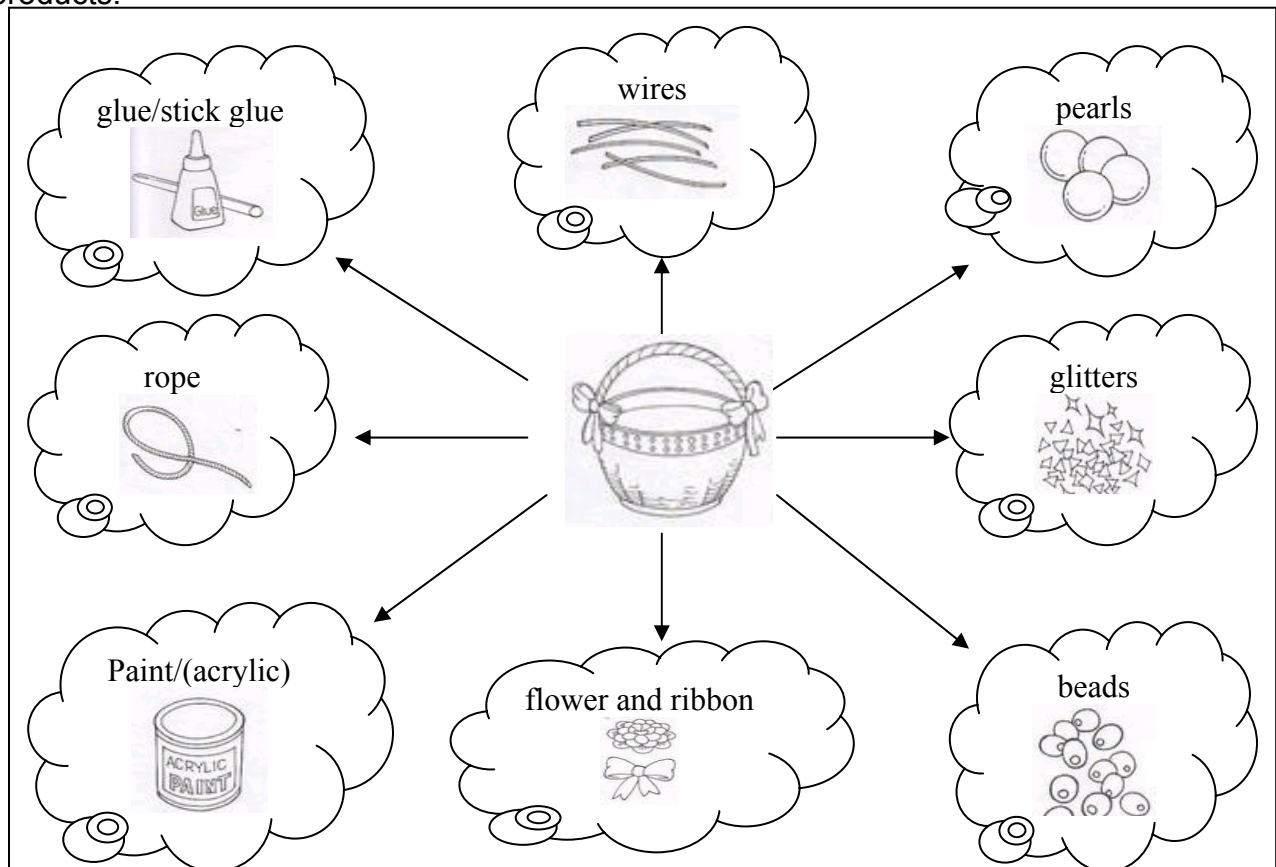
rattan		
leather		
coconut shell		

Lesson 3

Handicraft Supplies and Accessories

To enhance the appearance of handicrafts, supplies and accessories are used. Simple products look elegant and expensive if accessories are used properly. In this lesson, you will develop creativity in designing handicraft projects using various accessories.

Below are various supplies and accessories that can be used in making handicraft products.



Activity 3

From the various handicraft products you have seen, such as bags, lampshades, flower vases, and others, list down the accessories commonly used in each product.



Self-check:

Answer the question below:

1. What supplies and accessories can be used to enhance the appearance of handicraft projects? Cite some examples.

Lesson 4

Fundamental Processes in Handicraft Making

Do you know the fundamental processes in handicraft making? This lesson discusses the processing and treatment of materials before making them into useful products. Bamboo, for example, is treated to make it look desirable. Following are some of the fundamental processes involved in handicraft making.

1. Preserving and treating bamboo

To preserve its natural beauty, bamboo is treated in various ways. An example of this is the resin-oil extracting method. This method uses either the wet or dry process. In the wet process, the bamboo is soaked overnight in a solution of 0.1% to 1.2% caustic soda or carbonate of soda or boiled in the solution for 10-15 minutes.

In the dry process, bamboo poles are evenly heated over charcoal at a temperature of 49°C to 54°C for 20-30 minutes.

2. Bleaching

The process of whitening or removing color by sunlight exposure, air ventilation or through the use of chemical solution is called bleaching. Materials needed for bleaching are five to six tablespoons of salt, 16 liters of water and 5 liters of 50% hydrogen peroxide (H_2O_2), Volume 40.

Bleaching is done in bamboo. Bamboo is submerged in a container filled with water, hydrogen peroxide and salt solution. The bleaching solution is allowed to boil for an hour. Excess chemicals are washed off and the bamboo is dried under the sun.

3. Dyeing

Dyeing is the process of applying color into the material. Direct dyeing or reactive dyeing may be used.

In direct dyeing, vegetable dye is used on the bamboo splints. The bamboo splints are immersed in dyed boiling water until the desired color appears, then they are dried under the sun.

In reactive dyeing, the following materials are used: 30% of dye, 30 grams of salt per liquid, and fixing agent of 30 grams per liquid. The dye is dissolved in water and diluted to the final volume. The bamboo splints are soaked for 10 minutes, then salt is added and dyeing is continued for an hour. The dyed materials are soaked in running water and dried in the shade.

Activity 4

Practice dyeing and bleaching various materials used in handicraft.



Self-check:

Write C if the statement is correct and W if not.

- _____ 1. The resin-oil extracting method is done through either the wet or the dry process.
- _____ 2. In reactive dyeing, bamboo splints make use of vegetable dye.
- _____ 3. In bleaching bamboo, the solution is left to boil for an hour.
- _____ 4. Dyeing is the process of applying color into the material.
- _____ 5. In reactive dyeing, dyed materials are soaked in running water and dried under the sun.
- _____ 6. Processing and treatment are done before making the materials into useful products.
- _____ 7. In the dry process, bamboo poles are evenly heated over charcoal at a temperature of 49°C to 54°C for an hour.
- _____ 8. In dyeing, bamboo splints are soaked for 30 minutes.
- _____ 9. The amount of salt needed for bleaching is 10-15 tablespoons.
- _____ 10. Bleaching means whitening or removing color by exposing the materials to sunlight.



LET'S SUMMARIZE

- Identifying common hand tools and power tools used in handicraft making will make your work easier and faster. You can easily select the tools suited for your project.

- Knowing the characteristics of industrial raw materials used in handicraft contributes to a better job because the kind of project you will make depends on the characteristics of the material to be used.
- Applying appropriate supplies and accessories enhances the appearance of a project.
- Processing and treating handicraft materials will make them desirable. Various processes such as dyeing and bleaching should be properly observed to preserve the beauty of industrial materials.



POSTTEST

Directions: Fill-in the blank with the correct word or group of words to complete each statement.

1. A thread-like matter extracted from mature plants is called _____.
2. The process of whitening or removing color by sunlight is known as _____.
3. A type of saw used to cut wood across its grain is _____.
4. The handicraft material that comes in varied colors and textures is _____.
5. A measuring tool marked with the English or metric systems of measurement is _____.
6. The process of applying color to materials is called _____.
7. The handicraft material that is used in house construction, furniture making and other novelty crafts is _____.
8. The “wooden hammer” is sometimes called _____.
9. A tool used for drawing lines, marking off points in measuring, lining fine construction materials and boring holes is called _____.
10. The process of applying color into the material is known as _____.

Test II

Jumbled Letters

Form words out of the jumbled letters given below:

Clue: Supplies and accessories in handicrafts

1. R E W I
2. E G U L
3. N T I A P
4. R S I G E L T T
5. O R E P



ANSWER KEY

Pretest

Test I: Multiple Choice

- | | |
|------|-------|
| 1. b | 6. a |
| 2. a | 7. c |
| 3. c | 8. a |
| 4. d | 9. b |
| 5. b | 10. c |

Test II: Jumbled Letters

1. paint
2. rope
3. wire
4. glue
5. glitters

Lesson 1: Self-check

Matching Type

1. j
2. a
3. c
4. i
5. h
6. b
7. e
8. d
9. f
10. g

Lesson 2: Self-check

Materials	Characteristics	Uses
fiber	extracted from mature plants	brush, rope, doormats
bamboo	hard, sharp curved spines	house construction, furniture, novelty items
rattan	single stem easily splinted	baskets, hats, chairs, tables, caning the bottom of chairs
leather	comes in varied colors and textures	wallet, key holders, billfold, bag
coconut shell	hard, brittle	kitchen articles, doormats, rugs

Lesson 3: Self-check

Different supplies and accessories that can be used to enhance the appearance of handicraft projects.

1. paint
2. rope
3. wire
4. ribbon
5. flowers
6. glitters
7. pearls
8. beads
9. glue
10. lace

Lesson 4: Self-check

1. C
2. W
3. C
4. C
5. W
6. C
7. W
8. W
9. W
10. C

Posttest

Test I – Fill in the blanks

1. fiber
2. bleaching
3. cross cut saw
4. leather
5. ruler
6. dyeing
7. bamboo
8. mallet
9. scratch awl
10. dyeing

Test II – Jumbled Letters

1. wire
2. glue
3. paint
4. glitters
5. rope