

Chapter 3

Fibre to Fabric

FIBRE AND FABRIC/WHAT IS FIBRE AND FABRIC

A Fabric is a piece of cloth that we wear. This piece of cloth is made of fine strands of threads these threads are called **yarns**. These **yarns** are actually made of very fine strands which are called **fibre**.

TYPES OF FIBRE/WHAT ARE NATURAL AND SYNTHETIC FIBRES

There are two types of fibre which are:

- **Natural fibre:** Fibre which are obtained from plants and animals are called natural fibre. Cotton and jute are example of natural fibre which are obtained from plants. Whereas **silk is obtained from silkworms** and **wools which are obtained from flees/hair** of animals.
- **Synthetic fibre:** Fibre which are obtained from chemicals are called fibre. Polyester, nylon and acrylic are example of synthetic fibre.

SOME PLANT FIBRE: COTTON AND JUTE

Cotton: Cotton is obtained from fruit/flower(cotton bolls) of cotton plant. Cotton plants are grown in black soil, which are found in Gujrat and Punjab. When flower on cotton plants grow white cotton bolls are collected.

These cotton bolls contain seeds with them. Seeds are separated from cotton balls to get cotton fibre. So, the process of removing seeds from cotton bolls using combing is known as **Ginning**.

Jute: Jute is obtained from **stem** of jute plants. Jute plants are grown in hot and humid climate of West Bengal and Bihar. They are cheapest fibres.

SPINNING/WHAT IS SPINNING OF YARN

Spinning: Spinning is process of making yarns from thin strands of fibre. Fibres are stretched and twisted to make yarns. **Charkha and Takli** used to make yarns by spinning.

HOW YARNS ARE CONVERTED INTO FABRIC?

Yarns are converted into fabric using process of weaving or knitting.

Weaving: Weaving is a process of making fabric by arranging the two sets of yarns, together. One set of yarns runs horizontally and other vertically and both yarns are woven to make fabric. Handlooms are used to convert yarns into fabric using Weaving.

Knitting: In knitting, a single and long yarn is used to convert into a piece of fabric. Knitting needles are used to arrange the yarn to make fabric.

NCERT QUESTION-ANSWERS

1. Classify the following fibres as natural or synthetic: nylon, wool, cotton, silk, polyester, jute.

Answer.

Given fibres are classified as follows:

Natural fibres	wool, cotton, jute, silk.
Synthetic fibres	nylon, polyester

2. State whether the following statements are 'true' or false':

(a) Yarn is made from fibres.

- (b) Spinning is a process of making fibres.
- (c) Jute is the outer covering of coconut.
- (d) The process of removing seeds from cotton is called ginning.
- (d) Weaving of yam makes a piece of fabric.
- (e) Silk fibre is obtained from the stem of a plant.
- (f) Silk fibre is obtained from the stem of a plant.
- (g) Polyester is a natural fibre.

Answer.

- (a) True
- (b) False; The process of making yarn from fibres is called spinning.
- (c) False; Jute fibre is obtained from the stem of jute plant.
- (d) True
- (e) True
- (f) False; Silk fibre is obtained from cocoon of the silk moth.
- (g) False; Polyester is a synthetic fibre.

3. Fill in the blanks:

- (a) Plant fibres are obtained from _____ and _____.
- (b) Animal fibres are _____ and _____.

Answer.

- (a) fruits, stems
- (b) wool, silk

4. From which part of the plant cotton and jute are obtained?

Answer.

- (a) Cotton is obtained from the fruit of cotton plant. Cotton seed which is a fruit which on ripening splits open to release white fibres of cotton.
- (b) Jute is obtained from the stem of jute plant.

5. Name two items that are made from coconut fibre.

Answer.

Two items made from coconut fibre are: Ropes and mats.

6. Explain the process of making yarn from fibre.

Answer.

The process of making yarn from fibres is called spinning. Fibres from a mass of cotton wool are drawn out and twisted. This brings the fibres together to form yarn.