

Chapter 3: Fiber to Fabric

Aratrik Pal

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Types of Fibre

- Natural Fibres: Obtained from animals & plants
- Synthetic: Man-made

Animal Fibres

- Wool: Obtained from sheep, goat, yak, llama, alpaca
- Silk: From silkworm

Wool

- Obtained from hair of ...
- Thick coat of hair
- Uses:
 - Warm clothes
 - Carpets, upholstery
- Process:
 1. Fleece remove from sheep: shearing
 2. Hair removed during hot weather
 3. Sheep skin with hair is washed: scouring
 4. Washed skin sent to factory
 5. Sorted based on length, colour, etc.
 6. Small fluffy fibres (aka burrs) are removed
 7. Fibres are dyed
 8. Fibres straightened and rolled into yarn
- Shearing does not hurt sheep
- Indian breeds of sheep:

Name of breed	Quality of wool	State where found
Lohi	Good Quality wool	Rajasthan, Punjab
Rampur bushair	Brown Fleece	UP, Himachal Pradesh
Nali	Carpet wool	Raj, Har, Punj
Bakharwal	Woolen Shawl	Jammu and Kashmir
Marwari	Coarse wool	Gujarat
Patanwadi	For holstery	Gujarat

- Camel hair also used as wool
- Bactrian camel (2 humped) found in siberia
- Sheep from Goat: Angora
- Alpaca, Llama (camel) found in South America

- Rabbit: Angora (Turkey)

Silk

- Obtained from silkworm
- Softest and shiniest fabric
- Silkworm stay on mulberry trees
- Life Cycle:
 1. Lay eggs
 2. Eggs take 2/3 weeks for eggs to hatch (need warmth)
 3. Caterpillars release thread (silk) around themselves
 4. Caterpillars become cocoon
 5. Cocoons attach to mulberry stems
- Old method: Cocoons kept in sun and boiled water to extract silk
- New method (silkworms not harmed – ahimsa silk)
- Rearing: Growing of silkworms
- Reeling: Taking out silk from cocoons