Home Economics

Textiles, Clothing and Fashion



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Topic: The Textile Industry
Group Level: Form Four

This activity works great as an introduction to the Textile Industry as it exists today. Key points are highlighted, followed by review questions and an answer key.

Instructions:

- 1. Read the information on the textile industry.
- 2. Review what you have learned by answering the questions.
- 3. Use the answer key to assess your performance.

The textile industry is the industry responsible for converting raw material into a finished product, and it includes textile developing, producing, manufacturing, and distributing.

History of the Textile Industry

The development of the textiles industry			
Before 5000 BC	ore 5000 BC Prehistoric people use animal skin to make clothing		
5000 – 3000 BC	Skills in spinning, weaving and dying first developed.		
	People start to embroider and decorate fabric		
3000 BC	Linen woven in Egypt. Cotton spun in India. Wool fabric in common use in the		
	cold climate of northern Europe.		
3 rd century AD	Textiles industry in Britain. The Romans built first weaving mill in south-west		
	England.		
12 th century	Silk woven and spun in china. Over the next few centuries the textile industry		
	remains a cottage industry.		
14 th – 17 th century	The textile industry grows. Women mainly do the spinning, men are in charge		
	of weaving		
1589	Knitting machine invented by William Lee		
Early 18 th century	Cotton industry beginning to grow in Lancashire		
1733	Flying shuttle invented by John Kay. By 1760 the shuttle is in general use in		
	the cotton industry.		
1764 - 1779	Spinning speeded up by invention of the spinning jenny by James Hargreaves		
	in 1764, the water frame by Richard Arkwright in 1769 and the spinning mule		
	by Samuel Crompton in 1779		
19 th century	Textiles industry continues to grow. Further progress in the printing of		
	fabrics. Sewing machine invented. The start of mass-produced clothing and		
	other textiles products. The famous artist and textile designer William Morris		
	(1834 – 1896) founds a company to make furniture, tapestries, carpets and		
	furnishing materials.		
1907	The artificial silk fibre Rayon is produced and used for clothing and underwear		
1925	Acetate is used for dresses and jacket linings		
1939	Nylon produced. Used for stockings and parachute materials.		
1950	Elastane fibre, used in ladies' underwear and elastic, introduced. Today called		
	Lycra		
1956	Acrylic and polyester introduced to Britain. Used mainly for clothing		
1970s	Os Bonded fibres used in carpet and blanket manufacture		
1956 - 1996	Over 40 new fibres developed		
1990s	Computer technology revolutionizes design and manufacture of textiles. New		
	hi-tech fibres created and developed as a response to consumer/end use		
	needs		

The Textile Industry Today

It is a global industry with large companies employing many people and operating in many different countries around the world. Large amounts of data and graphics can be sent quickly around the world by ISDN (digital telephone lines) from one computer to another.

The use of new technology is becoming more widespread in the textiles industry. More companies are using Computer-Aided Design (CAD), Computer-Aided Manufacture (CAM) and Computer Integrated Manufacture (CIM) in the processing, designing, planning and manufacturing stages of textile products

Some of the people involved in textiles production:

- o Fibre technologists look at ways at improving fibres and design new hi-tech ones.
- o Textiles technologists add chemicals to improve performance of yarns.
- o Colourists create colour themes and ideas for yarn ranges.
- Textiles designers produce fabric designs.
- o Fashion designers design textiles products to be sold to the consumer.
- o Pattern makers create sample patterns and grade the patterns into the sizes needed.
- Quality control team check that products are of correct quality.

To increase your knowledge and understanding of the textile industry you can view the following YouTube video:

"The Textile Industry During The Industrial Revolution", Tara Mc Mullen

https://www.youtube.com/watch?v=w4gFwMh I6k

Review Questions



	iiiiiv.			
2.	Complete the following table.			
	Fibres developed between 1900 and 1960	What were they used for		
3.	What was the name of the machine invented in to mass-produce clothing?	n the 1800s which allowed textiles manufactures		
4.	to mass-produce clothing? How do Textiles Company send information qu	n the 1800s which allowed textiles manufactures		
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Answer Key

1. State the four main fibres used in textiles up to the beginning of the twentieth century?

i. Linen

ii. Cotton

iii. Wool

iv. Silk

2. Complete the following table.

Fibres developed between 1900 and 1960	What were they used for
Rayon	Clothing and Underwear
Acetate	Dresses and Jacket Lining
Nylon	Stockings and Parachute material
Elastane	Ladies underwear and Elastic
Acrylic	Mainly for clothing
Polyester	Mainly for clothing
Bonded fibres	Carpet and blanket manufacture

- 3. What was the name of the machine invented in the 1800s which allowed textiles manufactures to mass-produce clothing? Sewing Machine
- 4. Textiles Company send information quickly from one site to another by ISDN (digital telephone lines).
- 5. a. CAD Computer-Aided Design
 - b. CAM Computer-Aided Manufacture
 - c. CIM Computer Integrated Manufacture
- 6. a. Textiles technologists add chemicals to improve performance of yarns.
 - b. Fashion Designer design textiles products to be sold to the consumer
 - c. Pattern maker creates sample patterns and grade the patterns into the size needed.

References

Sinclair R. (1997) Skills in Textiles Technology. Heinemann Educational

IMAGE: Textile Industry

https://www.google.com/url?sa=i&url=https%3A%2F%2Fwww.publicdomainpictures.net%2Fen%2Fview-image.php%3Fimage%3D205766%26picture%3Dtextile-industry&psig=AOvVaw2-ZqhrC3XCifnOl1bJFNHv&ust=1588636536426000&source=images&cd=vfe&ved=2ahUKEwiZ59u08pipAhVRMIMKHcETAVUQr4kDegUIARCIAg

VIDEO: Mc Mullen T. The Textile Industry During The Industrial Revolution https://www.youtube.com/watch?v=w4gFwMh I6k