

Textile machines by Samah from Sudan

Almost everybody in Sudan knows Manchester as the industrial city to where our cotton was exported. In Sudan there is a kind of biscuit called Lancashire, however Manchester was known as a textile industrial area rather than a food-making area.

We have been today to the textile department in the Museum. We have watched a demonstration of three different machines.

The first one was the Mule, which was a combination of two older machines; the Water Frame Roller and the Spinning Jenny. The first one was used to straighten the cotton fibres and the second one was to spin them in order to make them stronger. Therefore the Mule covered both purposes. It was invented by Samuel Crompton in 1779. Mules worked normally in pairs. A mule worker was normally in charge of other workers who were called piecers and scavengers who were children and who were supposed to crawl under the machine to clean the floor and crawl back again within 11 seconds before the machine came back. The job was done either by orphan children or slaves who were only given food and accommodation as payment. I wonder whether the consumers have ever questioned the source of the beautiful textiles they used to benefit from and how many children were victims of them.

The second machine was called the Lancashire Loom or the Power Loom because it was driven by steam power and was invented in 1890. It consisted of a beam containing 1800 threads. Another part called the heddle was used to make gaps (sheds) between the threads to allow the weaving. The back to front side of the weave was called the warp, the right to left one was called the weft.

There was another part called the shuttle which was responsible for taking the weft thread through the warp. It used to move with a speed of 45 miles per hour. It had a sharp end which was dangerous to workers. It caused a lot of injuries and death sometimes. During the process of changing threads in the shuttle, the workers had to pull the end of the thread with their mouths; this was called shuttle kissing. A strange disease called Bisinosis was developed from inhaling cotton dust in addition to other illnesses which were transferred between workers among each other.

The third machine was used for weaving ribbons and labels with a complicated design. The woven labels in our clothes are made on modern versions of this machine. The machine was made by T Wilkinson and Co of Coventry and is about 110 years old. It was used in Coventry Technical College to train students.

Looking at the industrial developments is amazing for me. It shows the human creative power despite the fact that it has been at a cost. I wonder if there is a way to continue development and creation without being aggressive to each other or to our environment, without making ourselves or other creatures victims.

Read Samah's text and try and answer these questions

1. There are many **technical** words in this text: special words to do with machines and the cotton industry. Can you find them?

Machine words (8 words)	Textile words (7 words)

2. Samah writes about the **cost** of industrial developments. What does she mean? Can you give an example from the text?

3. Give an example of another human development that has a cost – something that has helped people, but has also had a bad effect.

This worksheet was produced by tutors from Manchester Adult Education Service, based on text written by Samah, an ESOL student attending a Summer School at MOSI in 2007.