

**Wednesday 1 February 2012 – Morning**

**GCSE DESIGN AND TECHNOLOGY Textiles Technology**

**A574** Technical Aspects of Designing and Making

Candidates answer on the Question Paper.

**OCR supplied materials:**  
None

**Other materials required:**  
None

**Duration:** 1 hour 15 minutes



Candidate forename		Candidate surname	
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Centre number						Candidate number				
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**INSTRUCTIONS TO CANDIDATES**

- Write your name, centre number and candidate number in the boxes above. Please write clearly and in capital letters.
- Use black ink. HB pencil may be used for graphs and diagrams only.
- Read each question carefully. Make sure you know what you have to do before starting your answer.
- Write your answer to each question in the space provided. If additional space is required, you should use the lined page at the end of this booklet. The question number(s) must be clearly shown.
- Answer **all** the questions in Section A **and** Section B.
- Do **not** write in the bar codes.

**INFORMATION FOR CANDIDATES**

- The number of marks is given in brackets [ ] at the end of each question or part question.
- The total number of marks for this paper is **60**.
- Your quality of written communication is assessed in the questions marked with an asterisk (\*).
- This document consists of **12** pages. Any blank pages are indicated.

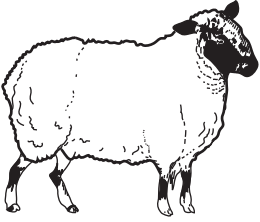
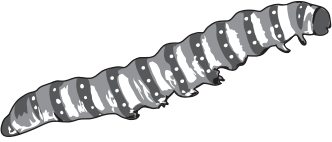

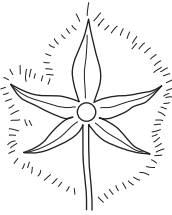
## Section A

Answer **all** questions.

- 1 (a) Complete the chart below by naming the fibre produced from each source.

Name **one** different product made from each fibre.

The first one has been done for you.

Source of fibre	Name of fibre	Product
	Wool	Jumper
		
		
		

[6]

(b)\* Explain the factors to consider when choosing a fabric for a textile product.

A series of horizontal dotted lines for writing, starting below the question and ending just above the [6] mark.

[6]

[Total: 12]

2 Fig. 1 shows hooded tops. They have a decorative design embroidered on the front.

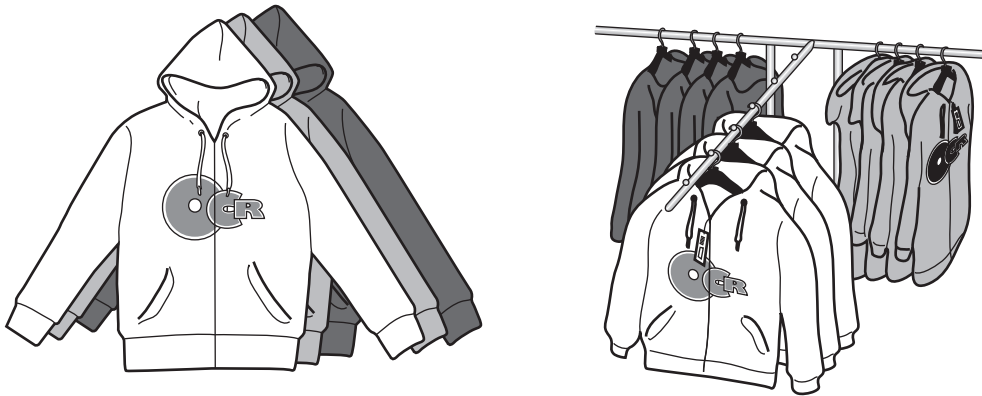


Fig. 1

(a) The hooded tops will be made using batch production.

(i) State the meaning of the term 'pattern grading'.

..... [1]

(ii) State the meaning of the term 'pattern lay'.

..... [1]

(b) The hooded tops will be assembled using sewing machines.

List **two** other tools or pieces of equipment needed to assemble the hooded tops.

1 .....

2 ..... [2]

(c) The manufacturer uses a steam dolly to finish the hooded tops.

Describe how the steam dolly is used.

.....  
.....  
.....  
.....  
..... [2]

- (d) The decorative design is to be embroidered onto the hooded tops using a computer controlled sewing machine.

Complete the chart to show the main stages in this process.

Stage 1	
Stage 2	
Stage 3	
Stage 4	
Stage 5	
Stage 6	

[6]

[Total: 12]

3 Fig. 2 shows a sports bag designed and made using CAD/CAM.



Fig. 2

(a) Complete the chart below.

Give an example of how the computer applications could be used when designing and making sports bags.

Type of application	Use when designing and making
Graphics programme	
Word processing programme	
Database	

[3]

(b) Give **two** ways of storing electronic data.

1 .....

2 ..... [2]

(c) Give **one** Health and Safety rule to follow when using a computer.

..... [1]

(d)\* Evaluate the effectiveness of the batch production system for producing sports bags.

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[6]  
**[Total: 12]**

**Section B**

Answer **all** questions.

- 4 A clothing manufacturer is to introduce a range of coats for primary school pupils.

The coat should be:

- adaptable for changing weather conditions
- easy to fasten
- appealing to primary school pupils.

- (a)** In the space below sketch a design for a coat for primary school pupils.

Annotate your sketch to show decorative and construction details and how it meets the specification.

**[6]**



- (b) Give **two** examples of Smart or Modern materials that could be incorporated in the design of the child's coat.  
State how each material would benefit the wearer.

Example 1 .....

.....

Benefit .....

.....

..... [2]

Example 2 .....

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Benefit .....

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..... [2]

- (c) State **two** quality control checks that should be carried out during the manufacture of the coat.

1 .....

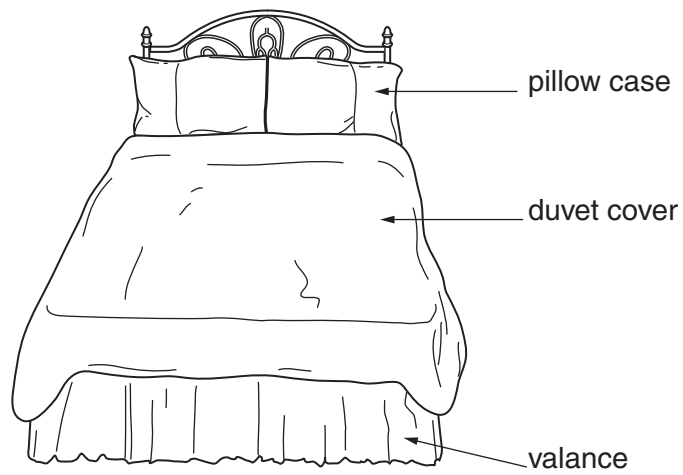
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2 .....

..... [2]

[Total: 12]

5 Fig. 3 shows a bedding set.



**Fig. 3**

(a) The bedding set has been coloured using the 'batch dyeing' process.

Describe, using notes and/or diagrams, the industrial process of batch dyeing.

(b) State **one** advantage of using synthetic dyes rather than natural dyes to colour fabrics.

.....  
..... [1]

(c) The bedding set has an 'easy care' finish.

Give **one** advantage and **one** disadvantage of an easy care finish.

Advantage .....

.....

Disadvantage .....

..... [2]

(d) Name **one** fastening that could be used on the duvet cover included in the bedding set.

..... [1]

(e) Give **three** different ways of recycling or re-using the bedding set.

1 .....

.....

2 .....

.....

3 .....

..... [3]

[Total: 12]

