



# **2011 Computing Studies**

## **Standard Grade – Foundation**

### **Finalised Marking Instructions**

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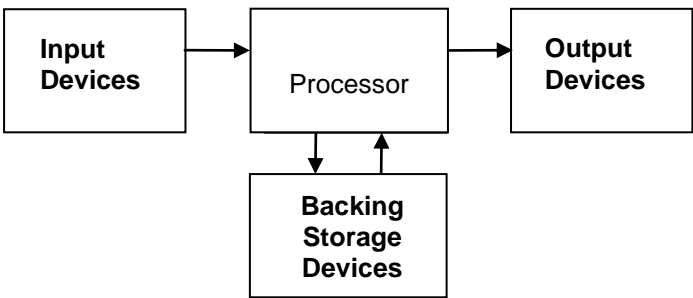
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## Part One: General Marking Principles for Computing Studies Standard Grade – Foundation

*This information is provided to help you understand the general principles you must apply when marking candidate responses to questions in this Paper. These principles must be read in conjunction with the specific Marking Instructions for each question.*

- (a) Marks for each candidate response must always be assigned in line with these general marking principles and the specific Marking Instructions for the relevant question.
- (b) Marking should always be positive ie, marks should be awarded for what is correct and not deducted for errors or omissions.
- (c) If a specific candidate response does not seem to be covered by either the principles or detailed Marking Instructions, and you are uncertain how to assess it, you must seek guidance from your Team Leader/Principal Assessor. You can do this by posting a question on the Marking Team forum or by e-mailing/phoning the e-marker Helpline. Alternatively, you can refer the issue directly to your Team Leader by checking the 'PA Referral' box on the marking screen.
- (d) Award **one** mark for each 'bullet' point where stated in the marking instructions.
- (e) On the MFI system, if a candidate has not answered or attempted a question a dash '-' must be placed in the mark column instead of a zero '0'.
- (f) When converting from Gigabytes/Megabytes/Kilobytes to bytes, '1024' is the only unit acceptable, eg 1024 bytes = 1 Kilobyte, 1024 Kilobytes = 1 Megabyte, 1024 Megabytes = 1 Gigabyte.
- (g) No piece of work should be ignored without careful checking. Candidates may have scored out an answer then written the correct answer at the back of the question paper. Make sure that every page is checked.
- (h) If the first answer has been scored out, but still readable, *and not replaced by another answer*, the question should be marked in the normal way. If you feel that a candidate has been disadvantaged by this action, make it a 'PA Referral'.
- (i) On the MFI system, if you come across a paper which is blank, scroll down to the end of the paper in-case the answers have been written on a separate piece of paper which will be scanned and added to the end of the on-screen paper.
- (j) Any references to trade names or commercial products, eg "Microsoft", "MSN", etc should be ignored, and then the rest of the answer should be marked. For example, if you received an answer "Microsoft Spreadsheet" then "Microsoft" would be ignored and "Spreadsheet" accepted, but "Microsoft Excel" would be ignored.

## Part Two: Marking Instructions for each Question

Question			Expected Answer/s	Max Mark	Additional Guidance
1	a		Spreadsheet	1	No other possible answer
1	b		text value formula <i>One mark for each correct answer</i>	3	No other possible answers
1	c		D6 & D8 one mark for each correct cell reference	2	No other possible answers
1	d		In case original is lost <b>OR</b> In case original is corrupted (any term linked to this eg virus)	1	Accept in case original damaged.
1	e		= SUM (D2:D6)	1	No other possible answer.
1	f	i	Chart(ing)	1	No other possible answer.
1	f	ii	Easier to view/Can see sales at a glance	1	No other possible answers
2	a		 <pre> graph LR     ID[Input Devices] --&gt; P[Processor]     P --&gt; OD[Output Devices]     P &lt;--&gt; BS[Backing Storage Devices]             </pre> <p><i>One mark for each correct answer.</i></p>	3	No other possible answers
2	b		Any <b>two</b> of: Floppy disk drive, USB Flash Drive, CD/DVD <i>One mark for each correct answer. Max 2 marks</i> Pen drive/stick .. magnetic tape/memory card	2	You cannot accept two different types of the same medium, ie DVD-R and DVD-RW.
2	c		<p>Contents of RAM is lost when power is switched off Contents of ROM is still there if power is lost. <i>(Either of above are acceptable for one mark – do not accept both for 2 marks)</i></p> <p>Contents of RAM can be changed Contents of ROM cannot be changed. <i>(Either of above are acceptable for one mark – do not accept both for 2 marks)</i></p>	2	No other possible answers

Question			Expected Answer/s	Max Mark	Additional Guidance
2	d		Input Output Output/input Backing Storage Input <i>One mark for each correct answer</i>	5	No other possible answers
2	e		Software Operating System Hardware <i>One mark for each correct answer</i>	3	No other possible answers
2	f		Visual Display Unit <i>One mark for each correct answer</i>	3	No other possible answers
3	a	i	Town or Address or Owners Name or House Type	1	No other possible answers
3	a	ii	House	1	No other possible answers
3	a	iii	Number of bedrooms/Price	1	No other possible answers
3	b		Any <b>two</b> of: Can hold a lot of data; Fast and easy to search; can be sorted (on different criteria); easily amended; data protected using passwords etc; Multiple users can access data at any time.  <i>One mark for each correct answer. Max 2 marks</i>	2	Easy to organise Takes up less space Backup copy
3	c	i	6	1	No other possible answers
3	c	ii	5	1	No other possible answers
3	d	i	To find all houses in Larbert the estate agent will <b>Search</b> for "Larbert" on the field <b>Town</b> .	2	No other possible answers
3	d	ii	To find the cheapest house the estate agent will <b>Sort</b> in ascending order on the field <b>Price</b> .	2	No other possible answers
4	a	i	Any <b>one</b> of the following: tins need to be identical; accuracy; repetitive task; can work 24/7.	1	Faster/quicker speed of production Faster than a human  Safety – justify

Question			Expected Answer/s	Max Mark	Additional Guidance								
4	a	ii	Any <b>one</b> of: To protect human workers; health and safety; Too dangerous for humans.	1	No other possible answers								
4	b	i	A robot which can move around the factory is called a <b>mobile</b> robot.	1	No other possible answers								
4	b	ii	Data sent from a sensor to a computer is called <b>feedback</b> .	1	No other possible answers								
4	b	iii	A robot moves because its parts are moved by a <b>motor</b> .	1	No other possible answers								
4	c		<table><tr><th>Task</th><th>Tool</th></tr><tr><td>Moving hot liquid</td><td><b>ladle</b></td></tr><tr><td>Moving a metal rod</td><td><b>gripper</b></td></tr><tr><td>Moving a large pane of glass</td><td><b>suction pad</b></td></tr></table> <p>One mark for each correct answer. Max 3 marks</p>	Task	Tool	Moving hot liquid	<b>ladle</b>	Moving a metal rod	<b>gripper</b>	Moving a large pane of glass	<b>suction pad</b>	3	No other possible answers
Task	Tool												
Moving hot liquid	<b>ladle</b>												
Moving a metal rod	<b>gripper</b>												
Moving a large pane of glass	<b>suction pad</b>												
4	d		<div><div>Price</div><div>Item Code</div><div>Country of Manufacture</div><div>Use By Date</div></div> <div><div></div><div>✓</div><div>✓</div><div></div></div> <p>One mark for each correct answer. Max 2 marks</p>	2	No marks if all 4 boxes ticked.  If 3 boxes ticked 2 correct then 1 mark  If 3 boxes ticked 1 correct No marks								
4	e		Any <b>two</b> of: less chance of entering wrong data; quicker to enter data; aids stock control; no need to price every item.	2	No other possible answers								
4	f		fast processing; large backing storage (Hard Disk)	2	Lots of RAM(memory) Stores more data								
4	g		Keyboard keypad Monitor	2	No other possible answers								
5	a	i	<b>Local Area</b> Network One mark for each correct answer. Max 2 marks.	2	No other possible answers								

Question			Expected Answer/s	Max Mark	Additional Guidance												
5	a	ii	Sharing peripherals; Sharing files; Sharing Software <i>One mark for each correct answer. Max 2 marks.</i>	2	No other possible answers												
5	b		Modem Browser <i>One mark for each correct answer. Max 2 marks.</i>	2	No other possible answers												
5	c		Any <b>two</b> of: email; text messaging; <b>(SMS)</b> fax; phone; <i>One mark for each correct answer. Max 2 marks.</i>	2	Video conferencing (call) Instant messaging Online chat/chat room discussion forum Social networking sites Webcam – justify answer												
6	a		An outline document with key features of document structure set up.	1	Accept reference to basic layout already setup in document.												
6	b		Drag and drop graphic click & move Cut and Paste Change justification of graphic	1	NOT move on its own No other possible answers												
6	c		<table><tr><th>Step</th><th>Order</th></tr><tr><td>Print invitation</td><td>5</td></tr><tr><td>Edit invitation</td><td>3</td></tr><tr><td>Load program</td><td>1</td></tr><tr><td>Save invitation</td><td>4</td></tr><tr><td>Open the invitation</td><td>2</td></tr></table> <i>One mark for each correct answer. Max 4 marks.</i>	Step	Order	Print invitation	5	Edit invitation	3	Load program	1	Save invitation	4	Open the invitation	2	4	No other possible answers
Step	Order																
Print invitation	5																
Edit invitation	3																
Load program	1																
Save invitation	4																
Open the invitation	2																
6	d		Folder	1	No other possible answers												
6	e		A	1	No other possible answers												
6	f		Presentation	1	No other possible answers												

[END OF MARKING INSTRUCTIONS]