

Mark Scheme November 2008

IGCSE ICT

IGCSE ICT (4385/2H)

4385 2H Markscheme

Question Number	Answer	Mark
1(a)	Trackball, touch pad, touch screen, joystick, any other suitable device. <p style="text-align: center;">2 marks</p>	(2)
1(b)	Answers may include: <ul style="list-style-type: none">• Caps Lock, allows letters to give upper / lower case. e.g. k and K• Num Lock, allows number pad to give numbers / move the cursor. e.g. 8 moves cursor up• Ctrl, allows letter keys to perform Functions / non-character actions, e.g. Ctrl + C = copy• Alt, allows letter keys to activate menus, e.g. Alt + H = help <p style="text-align: center;">2 x 3 marks</p>	(6)
		Total 8 marks

Question Number	Answer	Mark
2(a)	<p>Look for:</p> <ul style="list-style-type: none"> • Title / identification of the form • Staff information Name • Subject information Title + code / level • Pupil information. List • Date / return by date • Signature • Looks like a form (areas for writing, no drop down lists, no radio buttons, etc.) <p style="text-align: right;">max 6 marks</p>	(6)

Question Number	Answer	Mark
2(b)	<p>There are no marks for choosing a data item.</p> <p>For the code description, look for:</p> <ul style="list-style-type: none"> • Description and example match the data item chosen • Code is fixed length • Explanation is understandable / sensible. <p>e.g. Staff Name. 2 letters for first name and surname, / Mr. John Smith = JS</p> <p>Subject Name 4 letter abbreviation, / Geography = geog</p> <p style="text-align: right;">3 marks</p>	(3)
		Total 9 marks

Question Number	Answer	Mark
3(a)	Filter software / content restriction on browser, Mrs. Smith sets allowed / disallowed sites. Physical method e.g. child's computer in living room. Parents can see. 2 marks	(2)

Question Number	Answer	Mark
3(b)	Encryption of the file, brother would need password to read it. Password on BIOS / startup, brother would need key to start computer. Access rights / shares on drives / folders / files, brother cannot access over the network. Hide file / bury file in an unlikely place e.g. in system directory, harder for brother to find Disguise file / name file as something misleading e.g. videosys.dll, harder for brother to find 2 x 2 marks	(4)

Question Number	Answer	Mark
3(c)	Reason. WiFi point being used by someone outside of the house. 1 mark Prevention. Enable a security feature Description of security feature. e.g. <ul style="list-style-type: none"> • Protect with a password, only computers with password can use WAP. • enable IP / MAC / computer name list, only listed computers can use WAP. 2 marks	(3)
		Total 9 marks

Question Number	Answer	Mark
4(a)	<p>Answers may include:</p> <ul style="list-style-type: none"> • IR / light beam broken by visitor, photocell / light / IR receptor detects change /sends signal. • Mechanical switch / micro-switch, moved / switched by movement of turnstile • Pressure sensor in floor, triggered by visitor's weight. <p>Any other sensible arrangement. 2 marks</p>	(2)

Question Number	Answer	Mark
4(b)(i)	One is added to the visitor number / one is subtracted from empty spaces	(1)

Question Number	Answer	Mark
4(b)(ii)	One is subtracted from the visitor number / one is added to empty spaces	(1)

Question Number	Answer	Mark
4(c)	Subtract number out from number in	(2)

Question Number	Answer	Mark
4(d)(i)	Time Visitor number / empty spaces / Visitors per time period.	(2)

Question Number	Answer	Mark
4(d)(ii)	Database, easy to search / other sensible reason. OR Spreadsheet, easy to make graphs / other sensible reason.	(2)
		Total 10 marks

Question Number	Answer	Mark
5(a)	<p>Look for the following points:</p> <ul style="list-style-type: none"> • no need to learn HTML • package is WYSIWYG / no need to swap (from HTML view to browser) views • complex layouts are simple to set up • packages contain pre-made templates / examples to follow • packages have pre-made artwork / animations / effects. <p>Ignore references to features which would be inappropriate for an IGCSE ICT project,</p> <p style="text-align: center;">Max 3 marks</p>	(3)

Question Number	Answer	Mark
5(b)	<p>Look for the following points:</p> <ul style="list-style-type: none"> • Open picture in a graphics package • re-size to thumbnail / smaller / correct size • re-insert / re-save picture <p style="text-align: center;">3 marks</p>	(3)
		Total 6 marks

Question Number	Answer	Mark
6(a)(i)	A single binary digit (either a 1 or a 0)	(2)

Question Number	Answer	Mark
6(a)(ii)	8 bits	(1)

Question Number	Answer	Mark
6(a)(iii)	1024 bytes	(1)

Question Number	Answer	Mark
6(b)	<p>Answers may include:</p> <ul style="list-style-type: none"> • Video • Pictures • control signals. <p style="text-align: right;">2 marks</p>	(2)

Question Number	Answer	Mark
6(c)(i)	16 bits / 2 bytes	(1)

Question Number	Answer	Mark
6(c)(ii)	Can use more than 255 characters / more than ASCII / 65025 characters / multiple alphabets, etc.	(1)
		Total 8 marks

Question Number	Answer	Mark
7(a)	<p>In a graphical user interface.</p> <ul style="list-style-type: none"> • Drop down / pop-up list • clickable / selectable • at any time <p>In a menu driven interface.</p> <ul style="list-style-type: none"> • Not drop down / pop up • Keyboard entry • Selection required before program continues <p>In both. shows / allows selection of possible actions</p> <p style="text-align: center;">5 marks</p>	(5)

Question Number	Answer	Mark
7(b)	<p>Look for the following points.</p> <p>Suitable example. e.g. file... run / in an icon's properties What happens. Command line runs when enter is pressed / icon is clicked</p> <p style="text-align: center;">2 marks</p>	(2)
		Total 7 marks

Question Number	Answer	Mark
8(a)	<p>Validation.</p> <ul style="list-style-type: none"> • Check on data input • By computer / software • For acceptable / allowable data <p>Example of validation check:</p> <ul style="list-style-type: none"> • field • type of check • description of check. <p>Verification.</p> <ul style="list-style-type: none"> • Check that data is correct • Reasonable method: double entry, manual check of entry. <p>Example of verification check:</p> <ul style="list-style-type: none"> • Appropriate field <p style="text-align: right;">9 marks</p>	(9)

Question Number	Answer	Mark
8(b)(i)	Mileage	(1)

Question Number	Answer	Mark
8(b)(ii)	So that correct mileage is charged / next customer has correct starting mileage / legal / for servicing / anything reasonable.	(1)

Question Number	Answer	Mark
8(b)(iii)	Verify	(1)
		Total 12 marks

Question Number	Answer	Mark
9(a)	<p>Answers may include:</p> <p>A. contacting / booking with hotels / transport companies / tourist attractions.</p> <p>B. finding details of hotels/ airlines / tourist attractions.</p> <p>C. buying tickets for flights/ trains/ tourist attractions.</p> <p>D. arranging details for something which he has already purchased / is already a customer. e.g. flight times / meals / hotel rooms / excursions.</p> <p style="text-align: center;">4 marks</p>	(4)

Question Number	Answer	Mark
9(b)	<p>Answers may include:</p> <ul style="list-style-type: none"> • Web ring, e.g. linking tourist attraction sites, making it easier for him to find information. • Bulletin board. e.g. on a government site / foreign ministry / health ministry, e.g. for advice on visas / inoculations/ security • News group. e.g. to get information / opinions about a particular topic, such as train travel / local events / local food. • Chat room. e.g. to contact forum / newsgroup members, for further information. <p style="text-align: center;">2 x 2 marks</p>	(4)
		Total 8 marks

Question Number	Answer	Mark
10(a)	fibre optic copper cable radio any other sensible method <p style="text-align: right;">2 marks</p>	(2)

Question Number	Answer	Mark
10(b)	<p>Method, any given in (a).</p> <p>The marks are for a sensible explanation which matches the method chosen.</p> <p>Look for arguments for the chosen method and arguments against the other one. max of 3 marks for max of 3 marks against. Max 4 marks overall.</p> <p>Explanation may include:</p> <p>Copper cable.</p> <ul style="list-style-type: none"> • Extension of current system / no new technology needed. • More secure than radio. + reason • Less liable to interference, + reason • Cheaper than fibre optic, + reason <p>Fibre optic cable.</p> <ul style="list-style-type: none"> • Faster speed / higher bandwidth than others. • More secure than radio. + reason • Can connect over longer distance than others. <p>Radio.</p> <ul style="list-style-type: none"> • No cable laying between buildings. • More flexible than others. + reason • Faster to set up than others. + reason <p>Look for reverse arguments.</p>	(4)
		Total 6 marks

Question Number	Answer	Mark
11	<p>Includes test data Includes expected results</p> <p style="text-align: center;">2 marks</p> <p>Responses must include a reason</p> <p>Responses may include:</p> <p>Test of birthday feature using relevant data, to check it gives the correct answer.</p> <p>Spell check, to ensure no spelling mistakes.</p> <p>Content check / proof read, to ensure content makes sense / is what is needed.</p> <p>Colours / screen resolution / display check, to see that script displays correctly on different settings / on different computers.</p> <p>Run test, to check that script runs when clicked / invoked / goes to next screen on data entry.</p> <p>Any other sensible run-time testing, with a reason.</p> <p>Browser check, to see if script displays correctly in different web browsers.</p> <p>Any other sensible test, with a reason.</p> <p style="text-align: right;">Max 5 marks</p>	(7)
		Total 7 marks

Question Number	Answer	Mark
12(a)	RR / LL FFFFF U FFFF D 1 mark for turn RR/LL 1 mark for forward twice FFFFF and FFFF 1 mark for U 1 mark for D 4 marks	(4)

Question Number	Answer	Mark
12(b)	M = FU T / RR / LL FFD or M = FU T / RR / LL FD 3 marks	(3)

Question Number	Answer	Mark
12(c)	K = loop F until edge R / L loop F until edge 3 marks	(3)
		Total 10 marks

TOTAL FOR PAPER: 100 MARKS