

# INFORMATION AND COMMUNICATION TECHNOLOGY

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Paper 0417/11

Written Paper

## Key messages

Candidates appeared to be more knowledgeable than in previous years.

Candidates appeared to have sufficient time to record all their answers, with very few failing to answer all questions, except, where there appeared to be a gap in their understanding. Candidates found difficulty answering the questions concerning microprocessor control, data validation, preparation of material for a hard copy brochure, computer network devices, security of data and advantages and disadvantages of using computer networks.

Greater preparation by the candidates is required, and deeper coverage of the aforementioned topics is strongly recommended.

## Comments on specific questions

### Question 1

The vast majority of candidates gained full marks. The most common incorrect answer, among the very few candidates who answered incorrectly, was 'hard disc' for part (c).

### Question 2

This was generally very well answered. The majority of candidates gained both marks. A minority of candidates answered with input devices and a smaller minority used storage devices.

### Question 3

Candidates did not do as well as expected on this question with a number of candidates only achieving one mark. Many gave answers relating to cost and a number ignored the question and gave descriptions of the advantages of optical discs over fixed magnetic hard discs. Some even suggested that it was more portable than an optical disc.

### Question 4

Candidates did not do as well on this question as expected though most achieved three marks. A surprising number of candidates thought that DTP is used to create models.

### Question 5

The majority of candidates gained full marks. Answers from the rest of the candidates were evenly distributed among the options.

### Question 6

This question was very well answered with the vast majority of candidates gaining full marks. Occasionally, candidates seemed to rush and either omit one relevant instruction or insert an incorrect one.

### Question 7

This question was answered quite well on part **(a)** but less so on part **(b)**.

- (a)** Most candidates gave the correct answer but some clearly lacked sufficient knowledge of formulae and/or functions. Many of these candidates used invented words instead of SUM, whilst others gave incorrect cell references.
- (b)** Fewer than half the candidates gave the correct answer, with several candidates not being able to answer the question. A number used ROUND instead of MAX, some used LOOKUP and there were others who used SUM.

### Question 8

This was not very well answered, with a few candidates gaining marks in part **(a)** and a smaller number gaining marks in **(b)**.

- (a)** A significant number of candidates did not attempt this question. Those candidates who gained marks usually only gave one correct answer. Many gave the answer 'thermometer'. A number of candidates gave the answer sensor without saying what type of sensor. Some candidates wrote down any sensor they could think of, with 'wind sensor' and 'light sensor' seen among the answers. Some answers related to output devices such as 'motor' or 'heater'.
- (b)** A significant number of candidates did not attempt this question. Those candidates answering this question lacked an understanding of the processing which takes place. A number of candidates thought the sensor controls the process. On occasions, there was an inaccurate reference made on the actions of a microprocessor.

### Question 9

This question was fairly well answered with the majority of candidates gaining at least two marks. Candidates performed better on part **(a)** than part **(b)**.

- (a)** Most candidates gained their marks on this part. Many Candidates gave examples of data instead of stipulating the data type. Some candidates answered 'numeric' or 'integer' for part **(i)**.
- (b)** A significant number of candidates did not attempt this question. Incorrect answers stated most frequently was 'type check', with 'check digit' being the next most popular incorrect answer.

### Question 10

This question was quite well answered, though part **(a)** was better answered than the other parts.

- (a)** Most candidates gave two correct answers. Vague answers such as 'climate' were offered as were answers related to 'wind' without specifying speed or direction.
- (b)** A surprising number of candidates did not attempt part **(i)** and a substantial number did not answer part **(ii)**.  
  
A significant minority of candidates did not appear to understand the difference between analogue and digital data and so were unable to gain any marks. Those that did attempt part **(ii)** were the candidates who answered correctly for part **(i)** though some thought the answer was a modem.
- (c)** Most candidates gained at least one mark here, although a number of answers were rather vague. Correct answers tended to refer to the greater accuracy and readings taken at any time. Few candidates gained all three marks.

### Question 11

Overall, this question was well answered. A large majority of candidates gained full marks but a number of candidates gained low marks as they were unclear about the exact sequence. The main misunderstanding was the position of the implementation and evaluation steps.

### Question 12

Candidates had mixed fortunes with this question. Most did very well on parts **(a)** and **(b)** but not so well on part **(c)**.

- (a)** Nearly all candidates gave the two correct answers.
- (b)** The vast majority of candidates gave two correct answers.
- (c)** A surprising number of candidates did not attempt this question. Many candidates gave brand names which the syllabus does not allow. The front page of the exam paper clearly states:

***No marks will be awarded for using brand names of software packages or hardware.***

Quite a proportion of candidates did not take great care to read the question and gave multimedia answers, when the question referred to hard copy and also to preparing material.

### Question 13

Although candidates found this question difficult, most candidates were able to get at least one mark, usually in part **(b)**.

- (a)** A surprising number of candidates did not attempt this question. Many more seemed to miss the reference to computer networks in the question and related their answers to the power button, giving simplistic answers relating to turning computers on and off.
- (b)** This was not well answered though more candidates attempted this than part **(a)**. Candidates gained a mark for mentioning that it connects network/computers to the Internet. Very few alternative correct answers were provided by the candidates.

### Question 14

This was the question that candidates found the most challenging, though part **(a)** was much better answered than **(b)**.

- (a)** Most candidates were unable to gain more than one mark for this part. Candidates often gave very vague answers about committing computer fraud but without saying how this would occur. There were very few answers relating to 'changing data' or 'transferring money'.
- (b)** Many candidates were able to name authentication techniques but were unable to state their purpose.

### Question 15

Overall, this question was not really well answered with most candidates performing slightly better on part **(a)** compared to parts **(b)** and **(c)**.

- (a)** There were many answers which were not specific enough to gain any marks. There were many vague answers given such as 'cheaper', 'faster', 'you can learn more', 'you can access the Internet', and 'it's easier'.
- (b)** Most candidates only managed to get a mark for mentioning 'hacking'.
- (c)** Candidates tended to be too concerned with speed of access to the Internet. They gained marks generally referring to a laptop being more portable but many candidates were unable to score any marks as they did not give comparisons in their answer.

### Question 16

This question was quite well answered with many candidates giving at least two good points. There were many references to 'not having to travel', but often candidates did not refer to 'length of time' or 'cost'. In general there was insufficient detail given in answers provided by candidates.

### Question 17

This question was not as well answered as expected. Most candidates did slightly better on part **(b)** than on part **(a)**.

- (a)** Many candidates seemed to be unaware that the question was about analysis and design. Several candidates described how they thought an expert system worked and many others listed all five stages in the systems life cycle, failing to concentrate on analysis and design.
- (b)** This question has occurred before in a number of different guises but many answers were vague or appeared to be made up.

### Question 18

This question was well answered with many candidates gaining over half marks. Many candidates incorrectly gave RSI related answers when the question clearly stated 'other' possible health problems. Other candidates gave safety issues rather than health problems.

### Question 19

This question was answered well overall.

- (a)** Quite a significant number of candidates did not attempt this part of the question. Very few candidates gained all three marks, with many candidates giving three types of implementation or three ways of collecting information.
- (b)** A number of candidates did not attempt this part of the question. Very few candidates appeared to understand the question and gave very vague answers. Many referred to speed despite being told not to do so.
- (c)** Quite a significant number of candidates did not attempt this part of the question but not necessarily the same candidates who did not attempt **(a)**. A number of candidates did not read the question carefully asking for other features of a database and incorrectly used searches again.



# INFORMATION AND COMMUNICATION TECHNOLOGY

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Paper 0417/12

Written Paper

## Key messages

This year's paper proved to be a little more testing than previous years. Candidates appeared to have sufficient time to record all their answers with very few candidates not being able to answer all questions. They did, however, find difficulty answering the questions concerning selection of storage media, prevention of unauthorised access and comparison of different types of printer. Microprocessor control once again provided difficulties for candidates as did the data processing involved in booking systems and the comparison of the use of different devices for accessing the Internet.

## Comments on specific questions

### Question 1

Virtually all candidates gained full marks. The only very rare incorrect answer was when candidates answered 'graph plotter' for **D**.

### Question 2

This was generally well answered. Some candidates, however, incorrectly gave answers which were output devices or storage media.

### Question 3

Most candidates gained full marks but occasionally candidates gave an incorrect response for the third option.

### Question 4

Candidates did very well on this question with the vast majority giving two correct answers

### Question 5

Most candidates scored one or two marks. A number of candidates failed to compare the two methods, making statements about the use of computers and sensors. A number of candidates gave answers which appeared derived from previous examination mark schemes which did not relate to this experiment, and not conducted over a period of days/weeks and/or in severe weather conditions. The most frequent correct answers were 'less danger' and 'greater accuracy'.

### Question 6

Generally, candidates did quite well on this question, with the majority gaining three or more marks. A number of candidates omitted the PENDOWN instruction. A few candidates confused LEFT with RIGHT.

### Question 7

This question was answered very well, on the whole, with part **(d)** proving to be the most challenging part.

- (a)** Virtually all candidates gained this mark but very occasionally candidates just gave a column such as 'A' or sometimes reversed the notation such as 2B

- (b) Again virtually all candidates gained this mark but there was occasionally the use of 5D.
- (c) The vast majority of candidates gained the mark but not as many as in parts (b) and (c). A common error among those who answered incorrectly was to write there were 6 columns.
- (d) This was the part that a number of candidates found difficult. A number of candidates gave cells in column E.
- (e) This was answered very well with the large majority getting the correct answer.

#### Question 8

This question was well answered but, on the whole, candidates did better with validation rather than verification.

- (a) Most candidates gained both marks but a number of candidates gave 'double checking' instead of 'double data entry' and quite a number gave methods of validation. The mark scheme is quite clear regarding the answers required.
- (b) Most candidates did well on this question but a number thought that you would use a 'check digit' on the **Area\_code**.

#### Question 9

The vast majority of candidates gained all four marks, though some candidates did tick the 'faster cars' option

#### Question 10

Nearly all candidates gained full marks for this question.

#### Question 11

This question was quite well answered, although, candidates found (b) and particularly part (c) very challenging.

- (a) Although the question asked for an input form for one book, a number of candidates drew a table of books. Others included borrower details which were not required. Some candidates did not leave spaces for field contents and some forgot the navigation aids altogether.

However the vast majority of candidates managed to gain at least two marks.

- (b) This part was not really well answered with many candidates giving database software and a number choosing pen drive on the grounds of its portability.
- (c) This was the part that candidates found the most challenging. Candidates frequently gave incomplete answers. Many candidates identified the ways but could not describe them. As well as these omissions, completely wrong answers were often seen such as 'virus check' and 'encryption'.
- (d) Most candidates managed to gain at least one mark. Candidates often gave an incomplete description of 'direct changeover' and a number of candidates lost marks by only giving the names without a description.
- (e) This part was not answered very well. A number of candidates did not appear to understand 'documentation' and gave rather vague answers.

#### Question 12

This was reasonably well answered, though candidates performed better on part (a) compared with part (b).

- (a) The majority of candidates gained the mark here, though some candidates just reworded the question and gave card reader as their answer.

- (b) The majority of candidates gained at least one or two marks. Some vague answers were provided by candidates with some answers being equally true of a card system.

### Question 13

Generally a reasonably well answered question with most candidates making at least two good points, but a number of candidates were unable to answer the question sufficiently well. The question asked for advantages and disadvantages **in terms of cost**. These candidates ignored the cost aspect and gave general advantages and disadvantages.

### Question 14

Answers often lacked precision, with a number of candidates explaining how the devices worked. Many gave answers that were not **effects** on people's lifestyles but vague references to making tasks easier and people more comfortable.

### Question 15

This question was reasonably well answered with candidates gaining more marks on part (a) compared to the other two parts.

- (a) Most candidates gained at least two marks. A minority of candidates did not use the technical terms accurately but instead gave vague descriptions such as images are added which is a rewording of the question.
- (b) Many candidates ignored the word 'other' in the question and suggested variations on the theme of camera.
- (c) Candidates were often imprecise in their descriptions. Often there was no comparison and vague answers were given such as cheaper without stating 'to buy' or 'to run' or compared to other stated printers.

### Question 16

This was well answered on the whole with the vast majority of candidates gaining at least two marks.

### Question 17

This question was not well answered. Candidates often gave a description of the washing cycle rather than concentrating on what the microprocessor does.

### Question 18

This was not particularly well answered, although most candidates managed to gain a mark on each part.

- (a) Many candidates did not take into account that this was an online system and this question concentrated on checks that would be made on the account. Many gave PIN as an answer. Several gave validation checks.
- (b) Most candidates did not seem to realise that the question was referring to the theatre's computer, and instead referred to the financial processing that the bank's computer would perform.

### Question 19

Most candidates managed to gain marks on this question, but few gained more than three marks. Many failed to make a comparison or contrast and instead just made imprecise statements. The most frequently awarded mark was for 'portability'. It was surprising how few candidates referred to size either in terms of screen size or keyboard size.

# INFORMATION AND COMMUNICATION TECHNOLOGY

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Paper 0417/13

Written Paper

## Key messages

Candidates found the paper rather more difficult than last year. Most candidates appeared to have sufficient time to record all their answers with very few candidates failing to answer all questions. Candidates found difficulty answering the questions concerning user and technical documentation, data types and validation, comparing input devices, authentication techniques, online banking in general, computer control and measurement. Candidates still have a low understanding of expert systems.

## Comments on specific questions

### Question 1

The vast majority of candidates gained full marks.

### Question 2

Candidates tended to either gain both marks or no marks at all. Many imprecise answers were provided such as 'faster', 'easier' etc. and some even gave input devices for their answers.

### Question 3

A small number of candidates gained all four marks, but this was not as well answered as was expected. . Many candidates gave brand names which the syllabus does not allow. The front page of the exam paper clearly states:

***No marks will be awarded for using brand names of software packages or hardware.***

### Question 4

Many candidates did well on this question with most gaining at least three marks. Incorrect answers were usually as a result of confusion over statement 2 or statement 3.

### Question 5

Most candidates gained full marks. Incorrect answers were due to candidates believing that a TFT screen was an input device.

### Question 6

This question was answered well with the majority of candidates gaining at least four marks. However, a significant number of candidates omitted the PENDOWN instruction. Other candidates confused LEFT with RIGHT.

### Question 7

Candidates scored well on this question, but performed better on part (a) than part (b).

(a) Many candidates provided good answers with correct examples given. There was a tendency for some candidates to confuse 'abnormal' for 'extreme data'.



- (b) This part was not so well answered as part (a). Many candidates provided examples of the content of the documentation, rather than why they are needed. Some candidates had problems differentiating between 'technical' and 'user documentation'.

### Question 8

This was quite well answered, with the majority of the candidates gaining at least two marks. Candidates tended to lose the opportunity to gain marks by describing volatile and/or non-volatile in two or three different ways. There were a few examples where ROM and RAM were named correctly but the definitions were the wrong way round.

### Question 9

This question was quite well answered, with the vast majority of the candidates gaining at least half the marks available. Where candidates lost marks, it was due to the lack of an accurate definition of the application. The words online/Internet were frequently missing as candidates gave banking or shopping as their answer.

### Question 10

This question was very well answered, with the majority of candidates gaining full marks. The most frequent errors were either the interchanging of Chip and barcode reader or OMR being frequently given instead of MICR.

### Question 11

Overall, this question was reasonably well answered. Both parts were fairly well answered but few candidates gained full marks. More able candidates did better on part (a) whereas the weaker candidates did better on part (b).

- (a) Less than half the candidates gave a suitable medium. The majority of candidates did not give a medium and instead stated software such as Excel or Access. Some gave a relational database as the answer.
- (b) Most gave the correct answer but a significant number provided "Old Bear Stories" for their answer, suggesting that they had confused 'descending' with 'ascending'.
- (c) The majority of the candidates answered this correctly.
- (d) Many candidates provided an incorrect answer, with most suggesting 'numeric' despite the leading zero and presence of spaces in the data.
- (e) Many candidates did not give a reason and described the use of a key field instead.
- (f) The majority of the candidates answered this correctly.
- (g) A significant number of candidates did not attempt this question with only a few candidates providing the correct answer. Answers were generally vague, often being a validation check and a significant number of candidates did not attempt it.
- (h) Again, a substantial number of candidates did not attempt an answer. Many candidates named a check but provided no description or gave a generalised description, not relating it to the borrower number.
- (i) Most candidates obtained some marks but few obtained all 4. Many gave vague one word answers such as faster or easier.
- (j) This question was not well answered. Very few answers gave explicit comparisons between devices. Some candidates compared the use of input devices with hand writing the information.
- (k) This was not well answered particularly with User ID. Many gave a good answer for the password.



### Question 12

Candidates found this question the most difficult of all the questions. Candidates struggled with both parts.

- (a) There were many vague answers with many simply stating 'hackers would steal the money'.
- (b) This part was not well answered by the majority of the candidates, who gave the benefits to the customer rather than the bank.

### Question 13

Although many candidates gained at least two marks, a sizeable number did not. Many imprecise or incomplete answers were given such as making young people lazy or health issues without qualifying these.

### Question 14

The majority of the candidates gained full marks for this question.

### Question 15

Overall, this question was not well answered, though candidates tended to do better on part (a) than part (b).

- (a) There were many answers which were not specific enough to gain marks. Many thought the light sensor was intended to detect headlights. Many candidates thought that the car horn was used to activate the sound sensor.
- (b) A number of candidates could define measurement without giving the difference between it and control. Where marks were awarded, it tended to be for a good description of control rather than measurement. A number of candidates did not attempt this question.

### Question 16

This question was fairly well answered with most candidates doing a much better on part (a) compared to part (b).

- (a) Most candidates were able to give correct answers for microphone and speakers but many thought that a webcam was an output device.
- (b) A small number of candidates provided a correct answer to this part. Many ignored the question stem and explained the cost-savings. Many answers only described what could be done at a normal conference, and some thought that home comforts would play a large part.

### Question 17

This question was not well answered, with candidates appearing to do better on part (b) rather than part (a). Many candidates did not attempt part (b).

- (a) A sizeable number of candidates did not attempt this question. Expert systems appears to be a topic that most candidates struggle with. Some candidates did seem to know the components of an expert system but even these found difficulties in describing the part these played in the processing.
- (b) As stated above, a large number of candidates did not even attempt this question. Despite the question saying otherwise, some candidates still provided medical diagnosis as an answer. There were a mixture of incorrect answers including simple database applications, control systems and even health issues related to the prolonged use of computers.

### Question 18

This question well answered with the majority of candidates providing at least two good points. Many candidates achieved full marks.

**Question 19**

A substantial number of candidates did not attempt this question. Many candidates that did scored well, with the majority providing at least one good point for each of the terms. Some candidates confused the two terms but many gained full marks.

# INFORMATION AND COMMUNICATION TECHNOLOGY

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Paper 0417/21  
Practical Test A

## Key messages

- Candidates are reminded that printouts will not be marked if their names and details are missing, or that have their name and details written on by hand. Many marks were lost because of missing candidate details.
- Candidates are advised to check and recheck their text and data entry in the document, report, presentation and email, as so many marks were lost because of:
  - Incorrect capitalisation
  - Character or words missing or extras added
  - Omissions of spaces
  - Omissions of the full stop at the end of a sentence.
- Many marks were lost in all sections of the question paper, because candidates did not show they understood the difference between:
  - Serif and sans serif fonts
  - Portrait and landscape orientation
  - Left and right with alignment to margins.
- Candidates should be able to read their own screenshots, as marks will be lost if these are illegible. Many marks were lost because screenshots did not display the required information: document page size and margins must be shown in a screenshot of the relevant page setup window; database field names and types must be shown with a screenshot of the database table design and email folders, contacts and messages must be shown from within the email mailbox.

## General Comments

The majority of the candidates were able to attempt all the tasks on the paper, although every candidate made some errors, some of them very minor. As in previous years, there were two tasks that proved more difficult for many candidates. Firstly, there was the database work, both the report and the extract in the document. Secondly, many candidates were not able to accomplish the creation of a master slide in the presentation.

Some candidates did not print, for example, the edited document after producing a clear record of working on it. Perhaps a good strategy would be to advise candidates to read through the paper at an early stage of the examination and highlight points at which saving and printing are required.

Overall, the paper is very good at testing the skills of candidates and enabling those with excellent skills to show their ability whilst allowing the less able candidates to score some marks. Overall performance was good, with some candidates scoring very high marks. Marks ranged from candidates who scored in the 70s to some who scored less than 10.

Many candidates lost marks for careless mistakes; typing errors, all details not being visible or not doing exactly what was asked on the paper.

## **Document editing**

### Steps 3 to 28

A large number of candidates did not have a screenshot showing A4 paper and/or margins. On some documents the actual margins were noticeably different from those on the screenshot, even varying within the document.

The document was to be saved in the format of the software being used. That is, it should no longer be in rich text format.

There were some omissions here, but the majority of candidates showed the header/footer correctly, with most errors being in the lack of right alignment. Many candidates did not give the full path with the filename.

Most candidates entered the correct text and applied formatting to it correctly, though a significant number used incorrect capitalisation and/or did not use serif.

Some candidates put the section break and set 2 columns at the beginning of the document. Most candidates applied the correct column space of 1 cm, but some reverted to one column on page 1 or later in the document. A few did not set columns at all.

Some candidates used serif, not sans serif or did not set the correct font to all the body text. Most candidates used single line spacing and justification as specified, though many did not format the first paragraph as body text.

These were usually all identified and often formatted correctly, but sometimes there would be one or more missed or formatted inconsistently.

This was not well done either because of inconsistency or because of consistent spacing of much more than 11pt.

A significant number of candidates did not insert the complete table, omitting row 1, though mostly the table was in the correct place within the column width. For many, displaying text on one line was a problem with the font they had chosen (some used a smaller font to cope with this).

Few candidates achieved full marks for this: some did not resize or place the image correctly and some did not use text wrap. Most cropped the image as specified.

In most cases the bullets were applied correctly, but many were not indented correctly.

Many candidates interpreted this as 'final section' and formatted the final two paragraphs with or without the subheading. The border in many cases was omitted and instead of shading the entire paragraph, the colour of the words was grey instead. Also, there were some with a grey border rather than paragraph shading.

In many cases, this was not done correctly, with a large number of candidates manually found and replaced words, resulting in spelling errors. Many candidates did only one or two replacements, not three.

## **Database structure and report**

### Steps 30 and 31

Most candidates set the Yes/No/Boolean field correctly, but some set the *Insurance* field to integer. The *Daily\_Cost* format, checked on the report, was often incorrect and caused the loss of at least one new record mark if rounding occurred.

### Steps 32

These were usually added correctly, but needed to display Residential as Yes and show one decimal place for *Daily\_Cost* in order to get full marks. Some made errors in capitalisation or data entry e.g. Cornwl, Rib trip, Exterme.

- Step 35 A significant number of candidates were unsuccessful in deleting the relevant activities.
- Steps 36 and 37 Some candidates left the 's' off 'Activities', entered 'Activites', omitted initial capitalisation or used the query table name.
- Most candidates displayed the correct records, though a significant number failed to get one or another criterion correct. Some listed only the records from 'Ireland' instead of excluding those records. They were still awarded credit for such skills as this brief report demonstrated.
- Most candidates achieved data sort, though some did not sort *Daily\_Cost* in descending order.
- There were data entry errors in the new field *Course\_Cost*, but most candidates formatted the values to 2dp (though the currency signs varied from £, to \$, to others).
- Most candidates displayed the correct fields, but the majority were in the wrong order. This could be the result of not redesigning the report after using a sort wizard. The visibility of data and labels was much better than in previous papers.
- Almost all candidates printed in landscape, one page wide, though some printouts were in portrait orientation.
- Candidates lost marks on the label of 'Average cost per day' due to initial capitals being given to each word and/or a colon at the end of the label. The resulting average had some different values according to the number of records, but most were awarded a follow-through mark.
- Almost all candidates provided a report title and personal details, though some mixed up right/left, top/bottom. Many candidates did not display their name or details anywhere, so scored no marks for the report.
- Selection criteria needed wildcards for the search on *Activity*. There were a further two criteria needed to limit the selection. Sorting and selection of fields to display and the order of these fields might have been selected before exporting to the document.
- Steps 39 and 40 Many candidates did not insert the file at all or put it in the wrong place. This may be the result of finding the extract difficult to select from the database. Of those who did get the import, many did not get the correct list of records. Others did not sort the records or did not display the fields in the correct order.

### **Integration and document finalisation**

- Step 41 This single mark was lost by so many candidates for several reasons. There were fewer widows/orphans, split lists, etc. than usual. Many documents had large spaces, though some were necessary to prevent splits. There were many instances of the tops of columns not being level (proof reading tasks).
- Step 42 As has been mentioned elsewhere, some candidates, having recorded that they worked on the document, did not then print it.

### **Presentation**

- Steps 43 to 52 The Master slide was not created very well, though some candidates achieved full marks. Although many inserted the various elements, they were not necessarily displayed on every slide (slide 1 was often missing some or all of the elements). In some cases the elements had been inserted manually, so they were in different positions on the slides.

Most candidates did import the 7 slides, but some omitted bullets or merged two slides.

Most candidates did change the slide 1 layout, though there were some bullets (which should not have appeared on the title slide text).

Most candidates inserted the table and data, but some did not remove the shading, or, in so doing, removed the gridlines too. There were sometimes errors in capitalisation or spelling.

Some candidates did use a callout shape, but many more just entered the required text, some with errors or entered on the wrong slide. This was a newly tested skill.

Often there were errors in selecting the required data correctly for the creating of the chart, with spelling and/or capitalisation errors with the chart title and axes labels or displaying an unnecessary legend.

Some candidates printed only single slides only without the hand-outs with 6 slides per page.

### **Email Contact, Folder and Message**

Steps 53 to 58

The majority of the candidates did create a folder in the email structure, though there were errors like tawara ac or Tawara ac.

The email contact 'Nasser Salam' had various spellings like Naseer and Salem or had no initial capitals. The email address was well done.

The 'To:' email address suffered new errors where candidates had typed in the address rather than using the saved contact details. Many used To or Cc instead of Bcc for the second recipient. This may be a particular software issue.

The few errors were in spelling and/or capitalisation of the subject.

In the message text, the most common error was the omission of the full stop at the end of the message and/or failure to capitalise the first word 'Please' and/or omitting the "s" from "contents". A few candidates omitted the message altogether.

The majority of the candidates attached a document file, but some were of type rtf and others were databases or presentations. Earlier in the paper the candidates had the instruction to save the document in the format of their word processing software, i.e. changing the file type from rich text format.

The evidence document was usually printed, containing all or some of the screenshots taken during the examination.

### **Administration Issues**

Most centres seem to have understood the message NOT to use staples to keep pages together, however, some centres still persist in using string to tie pages in the Assessment Record Folder – this can potentially obscure text with the punch holes. If Centres/candidates are concerned about pages becoming lost, then a medium sized paper clip on the open long side of the ARF would suffice.

The prints from some centres were again very faint this year and so poor as to be hardly visible even with the aid of a magnifying glass. Centres must advise candidates to check that screen prints are of a size which is legible, otherwise they risk losing marks. They should also encourage the use of suitable plain fonts for what are, in effect, business documents rather than candidates wasting time searching for "fancy" fonts which do very little to enhance the document.

It was noted that the majority of the candidates seem to be taking on board the requirement to produce documents **as requested on the question paper** and not to waste time with embellishments - as such there were many who gained high marks. At the other end of the scale there were some who had marks of 20 or under.



# INFORMATION AND COMMUNICATION TECHNOLOGY

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**Paper 0417/22**  
**Practical Test A**

## Key messages

- Candidates are reminded that printouts will not be marked if their names and details are missing, or that have their name and details written on by hand. Many marks were lost because of missing candidate details.
- Candidates are advised to check and recheck their text and data entry in the document, report, presentation and email, as so many marks were lost because of:
  - Incorrect capitalisation
  - Character or words missing or extras added
  - Omissions of spaces
  - Omissions of the full stop at the end of a sentence.
- Many marks were lost in all sections of the question paper, because candidates did not show they understood the difference between:
  - Serif and sans serif fonts
  - Portrait and landscape orientation
  - Left and right with alignment to margins.
- Candidates should be able to read their own screenshots, as marks will be lost if these are illegible. Many marks were lost because screenshots did not display the required information: document page size and margins must be shown in a screenshot of the relevant page setup window; database field names and types must be shown with a screenshot of the database table design and email folders, contacts and messages must be shown from within the email mailbox.

## General Comments

The majority of the candidates were able to attempt all the tasks on the paper, although every candidate made some errors, some of them very minor. As in previous years, there were two tasks that proved more difficult for many candidates. Firstly, there was the database work, both the report and the extract in the document. Secondly, many candidates were not able to accomplish the creation of a master slide in the presentation.

Some candidates did not print, for example, the edited document after producing a clear record of working on it. Perhaps a good strategy would be to advise candidates to read through the paper at an early stage of the examination and highlight points at which saving and printing are required.

Overall, the paper is very good at testing the skills of candidates and enabling those with excellent skills to show their ability whilst allowing the less able candidates to score some marks. Overall performance was good, with some candidates scoring very high marks. Marks ranged from candidates who scored in the 70s to some who scored less than 10.

Many candidates lost marks for careless mistakes; typing errors, all details not being visible or not doing exactly what was asked on the paper.

## **Document editing**

- Steps 3 and 4 A large number of candidates did not have a screenshot showing A4 paper and/or margins. On some documents the actual margins were noticeably different from those on the screenshot, even varying within the document.
- Step 5 The document was to be saved in the format of the software being used. That is, it should no longer be in rich text format.
- Step 6 The majority of the candidates showed the header/footer correctly, with most errors being in the lack of right alignment. Many candidates did not give the full path with the filename.
- Steps 7 to 11 The text entry (Title and sub-title) was accurate and, for the majority of scripts, so was the overall formatting.
- Step 12 Most candidates applied the correct column space of 2 cm to the body text, but some reverted to one column on page 1 or later in the document. A few did not set columns at all. Occasionally settings were in inches.
- Step 13 The majority of the candidates correctly applied shading to the title text, but a few took it literally, or perhaps took the illustrative image in the question paper literally, and the border did not extend fully to the left hand margin. There were also variations on using a border and shading; sometimes around both title and subtitle, but the border was not from margin to margin; around each line of text separately; a border used but no shading or a thin border but correct shading.
- Step 14 Set font: A number of candidates failed to capture the tail end of the last sentence when formatting the document, resulting in anything from a few characters to a few words in sans-serif font. Line spacing and alignment were usually correct, but not always applied consistently to all the body text.
- Step 15 The subheadings were generally all identified and often formatted correctly, but sometimes there would be one or more missed or formatted inconsistently.
- Step 16 There was some inconsistency in the number of spaces after a paragraph or there was consistent spacing of much more than 12 points.
- Steps 17 and 18 In most cases bulleting was applied correctly, but many were not correctly indented.
- Steps 19 to 25 A number of candidates did not insert the complete table text from the file, omitting row 1, though mostly the table was in the correct place within the column width. If the first line of text was missing, then there could be some problems in following the formatting instructions, but credit for follow through errors was given when appropriate. The specified row was usually deleted although sometimes only the text was removed. There were very few scripts where the table was missing altogether.
- Steps 26 to 28 The image was imported, placed and resized well. It was also flipped horizontally (but sometimes vertically as well).
- Step 29 In many cases, candidates manually found and replaced words, resulting in spelling errors. Some candidates did only one or two replacements, not three.
- Step 30 Candidates should focus on the overall layout of their document and check that there are no split lists or tables and that subheading are not left on their own at the foot of a column or page. They should also check for consistency of spacing between paragraphs, etc. against the specifications of the paper.

Step 31 As has been mentioned elsewhere, some candidates, having recorded that they worked on the document, did not then print it.

### **Database structure**

Steps 32 to 34 Many candidates successfully excluded the *Tonnage* field from their imported data. Most set the two fields as logical Boolean Yes/No types, but a significant number did not display in this format as specified (using check boxes or 0/-1, etc. formats). If the *Length* field data type was set to integer, all decimal place values were lost. Not setting the display to one decimal place was a common error.

Steps 35 to 37 The three new records were generally added correctly, but there were spelling errors, and further errors resulting from field formats (*Length* as integer, *Shellfish* not as Yes/No). Some submitted a new database containing only these records as their report 1.

Step 38 In the record for *Tenacity*, *Looe* was amended to *Conwy* by most candidates.

### **Report 1**

Steps 39 and 40 The majority of candidates succeeded in producing this report.

Capitalisation for the title and for the new field *Fees\_Due* was occasionally incorrect. The new field with its calculated value and formatted display was generally well done.

Setting the *Length* field to one decimal place resulted in some records near to 12 being displayed as 12 and, hence, appearing not to meet the criterion of less than 12. This may have puzzled the observant candidate. No candidates were penalised if they tried to amend the records to show only those displayed as less than 12. If the *Hull* or the *Shellfish* search criteria were not set, then a long report was produced. (Candidates should be aware that a long report most probably results from a selection error and should re-examine their search criteria).

A minority of candidates could not apply the sort on *Length*, for example, because of the data in the field. On the whole, candidates interpreted and applied the instructions well, apart from displaying the fields in the specified order and ensuring that all data was visible. Landscape orientation was correct on all but a few scripts.

### **Report 2**

Steps 41 and 42 The majority of the candidates created this report successfully. Some only sorted on one field. Most created the average length successfully, and were awarded marks for follow through if this resulted from the field format (i.e. integer). The input of the title was, for the most part, accurate. Presentation of the fields in the specified order was often not met as the report design was not modified after the sorting of the records.

### **Presentation**

Steps 43 and 44 This task was, for the most part, carried out successfully. The majority of the candidates successfully found a suitable clip art image for the Master Slide element.

The majority of the candidates set the bullet types (square/arrow) but overlooked the 'italic' instruction for the second level bullet text.

Master slide elements were sometimes not applied to the new first slide inserted in the presentation.

- Steps 45 to 47 Most candidates inserted a new slide and applied the correct layout of Title and Subtitle on this new slide. Text entry was usually accurate. The majority of candidates successfully added the star shape and its text.
- Steps 49 to 50 Selection of correct data was often not accurately performed with the total values also included.  
The chart was sometimes incorrectly inserted to the right of the bulleted text.
- Steps 50 and 51 The two formats for printing were usually selected correctly.

### Evidence document

- Steps 52 to 57 The folder name "Fishing" was sometimes in all capitals and occasionally this was not created in the email programme.
- There were sometimes spelling errors in the name Yassin Sayed.
- The email was correctly addressed, but many candidates did not demonstrate they had used the cc line for Yassin Sayed. (This may be a software issue).
- The attachment was often a rich text format file. This was used as evidence that the candidates had not saved the revised document in the software being used (see step 5).
- There were 2 common errors in the email text – "I" in lower case and the omission of the final full stop.

### Administration issues

Most centres seem to have understood the message NOT to use staples to keep pages together; however, some centres still persist in using string to tie pages in the Assessment Record Folder – this is a real nuisance (in potentially obscuring text with the punch holes). If Centres/candidates are concerned about pages becoming lost, then a medium sized paper clip on the open long side of the ARF would suffice.

The prints from some centres were again very faint this year and so poor as to be hardly visible even with the aid of a magnifying glass. Centres must advise candidates to check that screen prints are of a size which is legible, otherwise they risk losing marks. They should also encourage the use of suitable plain fonts for what are, in effect, business documents rather than candidates wasting time searching for "fancy" fonts which do nothing to enhance the document.

It was noted that the majority of the candidates seem to be taking on board the requirement to produce documents **as requested on the question paper** and not to use up valuable time with embellishments, which meant they achieved high marks. At the other end of the scale, there were some candidates achieving marks of 20 or under.

# INFORMATION AND COMMUNICATION TECHNOLOGY

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Paper 0417/31  
Practical Test B

## General comments

Overall, there were slightly fewer candidates achieving excellent results on this paper than in previous sessions. The paper gave a good spread of marks. In previous sessions, for a significant number of candidates, the website authoring section of the paper was their strongest element, but in this session, the candidates were required to create a new cascading stylesheet.

In general, candidates appeared well prepared for this examination and the vast majority who submitted their work showed sound knowledge, skills and understanding, with the majority of candidates completing all elements of the paper. Results were very often centre-based. There is evidence that some candidates are rote-learning sets of skills to pass the practical examinations, rather than having the underlying knowledge and understanding to underpin these skills and allow the skills to be applied in any context. This may have been the reason for the reduction in the number of candidates achieving the higher marks on the stylesheet question. There were a significant number of typographical errors in both the website and spreadsheet elements of the paper. Many of these inaccuracies could have been avoided with more careful checking and correction.

Centres **should not** staple the work, hole-punch or tie it together with string. A number of candidates lost marks due to the holes taking out some of the header text being marked. Occasionally, scripts were tied in the middle of the pages, making them difficult to open/turnover for marking. Work should be submitted in the ARF along with the question paper; both the ARF and question paper should have hand written on it, the candidate's name, Centre number and candidate number. It is essential that **ALL** candidates adhere to these instructions.

A very small number of candidates did not print their name, Centre number and candidate number on every document submitted for assessment. It is important that candidates do this, as without clear printed evidence of the author of the work, marks cannot be awarded by the Examiner for these pages. It is not acceptable for candidates to hand annotate their printouts with their name, as there is no real evidence that they are the originators of the work. A number of candidates omitted one or more of the pages from the required printouts. Some candidates submitted multiple printouts for some of the tasks and as instructed crossed out those printouts that were draft copies. If multiple printouts are submitted without draft versions being crossed through, only the first occurrence of that page will be marked.

One significant issue in this session was the number of candidates who presented evidence of their cascading stylesheets (and sometimes their spreadsheets) in printouts that were produced with fonts so small to make it difficult for Examiners to read. Candidates should check each printout to ensure it is large enough to be read, and if necessary, restyle/reprint accordingly. Where Examiners are unable to read the materials presented, they cannot award candidates the marks. Similarly, some candidates did not achieve marks as a result of presenting screenshots with elements cropped or where part of the text was obscured by another overlaid window, for example, where part of the stylesheet was overlaid by a window containing a list of files.

Candidates are required to highlight elements of the html markup. It is important for them to choose their colours carefully so that the Examiner can read the markup.

## **Comments on specific questions**

### **Question 1**

The majority of the candidates created the evidence document successfully.

### **Question 2**

The majority of the candidates downloaded the required images and stored them as instructed.

## **Website Authoring – Cascading Stylesheet**

### **Question 3**

This was a different style of question to those found in previous sessions which required the candidates to create a stylesheet. This presented a challenge to many candidates. A significant number of candidates mixed up HTML and CSS and used html syntax in their CSS declarations. Due to the recent changes in HTML and CSS syntax, many of the elements that were previously contained within HTML tags and attributes have now moved into the cascading stylesheet. This means that the previously acceptable HTML attributes for things like table elements have now been deprecated by **w3.org** and therefore would not display in all browsers. Many candidates scored well on this question, but there were few candidates who attained full marks. A significant number of candidates added extra fonts to their definitions, not just those required by the question paper, or named a specific font instead of the generic font names.

The one area that caused some candidates an issue was the interpretation of the question from 'External border' to definitions at 'table' level and 'Internal gridlines' to definitions at table data ('td') level. Some candidates did not set all hexadecimal values to 6 digit numbers.

Some candidates did not set all hexadecimal values to 6 digit numbers whilst others omitted the # to signify that the data contained a hexadecimal value.

## **Website Authoring – HTML**

### **Question 4**

This question was completed well by the majority of the candidates. A number of candidates added in-line styles in the markup despite the question paper rubric at the top of page 3, or overwrote the styles in the html, particularly for the table.

### **Question 5**

The first part of this question was completed well by the majority of candidates, with many showing that they had edited the attributes and set the image to 300 pixels square. A minority of the candidates set the alternative text ('alt') attribute to display the text 'Manta image'. A number of candidates set this alternative text but were not careful with the text entry, introducing errors in case or spelling.

### **Question 6**

This question was completed well by many candidates. Several candidates created the opening part of the anchor '<a... >', but omitted the '</a>' close anchor statement. There were a few typographical errors in the entry of the URL. Some candidates used an absolute file path for the hyperlink reference which would not function correctly in most computers when the webpage was uploaded to a web server. A number of candidates did not set the target window as specified to "\_manta". A small number of candidates set up this hyperlink and the correct target window, but did not create it from this text, some placing the <a> and </a> tags together so the link could not be accessed.

### **Question 7**

The majority of the candidates who attempted this question using a 'mailto:' statement gained full marks. Some candidates tried to hyperlink to the email address as though it were a URL, expecting the hyperlink to open a webpage rather than an email client.

### Question 8

The majority of the candidates used the text 'click on this link' to create the hyperlink and therefore achieved the first mark. Most candidates correctly included the href="mailto: command with the correct email address. Many candidates attempted the subject line with the correct leading "?", but some candidates allowed spaces within this text. Some errors made by candidates would have been avoided if they had tried the hyperlink to check that it opened their email software, and set all elements as specified in the question paper.

### Question 9

The majority of the candidates completed this step successfully.

### Question 10

A small number of candidates from a range of Centres did not correctly place the browser view as a screenshot within their evidence document. Candidates must ensure that it is clear to the Examiner that this is a screenshot of their browser. If candidates crop the image so that this evidence is not visible to the Examiner, then no marks can be awarded for this.

### Question 11

The majority of the candidates completed this step successfully, although many candidates submitted this evidence where the text was so small it was extremely difficult for Examiners to mark the work and give candidates full credit. It is important that all work is printed so that it is easily read.

### Data Analysis

### Question 12

The majority of the candidates completed this step successfully.

### Question 13

The majority of the candidates completed this step well, although there were a number of transpositions between left and right and some inaccuracies in the data entry for 'Week 4' and 'Last edited by'.

### Question 14

Many of the candidates completed this step well, although, like the header, there were a number of transpositions between left and right. There were more inaccuracies in the data entry in the footer than the header, with a significant number of candidates failing to include the word 'at' between the date and time.

### Question 15

The most common error was left aligning the text in the merged cell rather than centre aligning it. Some candidates did not set the text colour to a white sans-serif font.

### Question 16

Many of the candidates completed this task as specified, although there were a number of scripts with these cells formatted as currency values with a single currency symbol.

### Question 17

This question attained a number of responses from candidates. Several candidates omitted this step completely, although most candidates used a SUMIF or SUMIFS function to attain correct results. Some candidates ignored the specification to use both absolute and relative referencing. This cell was infrequently formatted in the correct format, using either the correct symbols or the ISO code.

### Question 18

The majority of the candidates completed this step successfully.

### Question 19

Despite the candidates' use of electronic encyclopaedia or the Internet, a significant number of candidates did not identify the correct symbols or number of decimal places for each different response. Those candidates, who demonstrated sound search skills, applied these well and generally attained full marks.

### Question 20

The majority of the candidates created the name range as specified and showed evidence in their document.

### Question 21

Candidates who opted to use a VLOOKUP or LOOKUP function for this question generally scored well, but a number of alternative attempts were tried, particularly where candidates had anticipated a question involving nested IF statements. Most candidates (with the exception of the nested IF attempts) used the named range Rate to attain the correct lookup value, but a significant number of these did not multiply this value by the contents of the Amount column.

### Question 22

The majority who attempted this question successfully calculated the total income for the week.

### Question 23

Although some candidates completed this step successfully, many did not set the specified cells into Brazilian Real, either with the R\$ prefix (or suffix) or with the BRL ISO code.

### Question 24

A number of candidates omitted this step, but those identifying the use of a SUMIF (or SUMIFS) function frequently scored full marks. The final part of the question requiring the candidate to apply appropriate formatting was often omitted or performed incorrectly.

### Question 25

The majority of the candidates, who attempted this question and submitted printouts, completed this correctly.

### Question 26

The majority of the candidates, who attempted this question and submitted printouts, completed this correctly. A small number of candidates printed this in portrait orientation and/or spread over two pages wide.

### Question 27

A number of candidates produced what appeared to be correct results for the chart, but omitted showing the Examiner the formulae used, or results generated, in order to gain all marks. There were a significant number of candidates erroneously opted for bar charts to compare and display the percentage values. Labelling of the chart was often weak with single word chart titles frequently seen.

### Question 28

The majority of the candidates printed the evidence document.



# INFORMATION AND COMMUNICATION TECHNOLOGY

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Paper 0417/32  
Practical Test B

## General comments

Overall, there were slightly fewer candidates achieving excellent results on this paper than in previous sessions. The paper gave a good spread of marks. In previous sessions, for a significant number of candidates, the website authoring section of the paper was their strongest element, but in this session the candidates were required to create a new cascading stylesheet. This meant the website authoring was the weaker area for many candidates.

In general, candidates appeared well prepared for this examination and the vast majority who submitted their work showed sound knowledge, skills and understanding, with the majority of the candidates completing all elements of the paper. Results were very often centre-based. There is evidence that some candidates are rote-learning sets of skills to pass the practical examinations, rather than having the underlying knowledge and understanding to underpin these skills and allow the skills to be applied in any context. This may have been the reason that fewer candidates achieved excellent results on the stylesheet question. There were a significant number of typographical errors in both the website and spreadsheet elements of the paper. Many of these inaccuracies could have been avoided with more careful checking and correction.

Centres **should not** staple the work or hole-punch or tie with string. A number of candidates lost marks because the holes had taken out some of the header text being marked. Occasionally, scripts were tied in the middle of the pages making them difficult to open/turnover for marking. Work should be submitted in the ARF along with the question paper; both the ARF and question paper should have hand written on it, the candidate's name, Centre number and candidate number. It is essential that **ALL** candidates adhere to these instructions.

A very small number of candidates did not print their name, Centre number and candidate number on every document submitted for assessment. It is important that candidates do this, as without clear printed evidence of the author of the work, marks cannot be awarded by the Examiner for these pages. It is not acceptable for candidates to hand annotate their printouts with their name as there is no real evidence that they are the originators of the work. A number of candidates omitted one or more of the pages from the required printouts. Some candidates submitted multiple printouts for some of the tasks and as instructed crossed out those printouts that were draft copies. If multiple printouts are submitted without draft versions being crossed through only the first occurrence of that page will be marked.

One significant issue in this session was the number of candidates who presented evidence of their cascading stylesheets (and sometimes their spreadsheets) in printouts that were produced with fonts so small, making it extremely difficult for Examiners to read. Candidates should check each print to ensure it is large enough to be read, and if necessary restyle/reprint accordingly. Where Examiners are unable to read the materials presented, they cannot award candidates the marks. Similarly, some candidates did not achieve marks as a result of presenting screenshots with elements cropped or where part of the text was obscured by another overlaid window, for example: where part of the stylesheet was overlaid by a window containing a list of files.

## Comments on specific questions

### Question 1

This question was completed well by most candidates, as evidenced by their subsequent printouts of this evidence document.

## Question 2

The majority of the candidates had located and downloaded the files from the website.

## Website Authoring – Cascading Stylesheet

### Question 3

This was a different style of question to those found in previous sessions which required the candidates to create a stylesheet. This presented a challenge to many candidates. A significant number of candidates mixed up HTML and CSS and used html syntax in their CSS declarations. Due to the recent changes in HTML and CSS syntax, many of the elements that were previously contained within HTML tags and attributes have now moved into the cascading stylesheet. This means that the previously acceptable HTML attributes for things like table elements, have now been deprecated by **w3.org** and therefore would not display in all browsers. Many candidates scored well on this question, but there were few who attained full marks.

The one area that caused some candidates an issue was the interpretation of the question from 'External border' to definitions at 'table' level and 'Internal gridlines' to definitions at table data ('td') level. For this paper, more able candidates set the borders for the table and table data in a single statement like `table, td {border: solid 1px;}` which worked well as both internal and external gridlines were set to 1 pixel. Some candidates did not set all hexadecimal values to 6 digit numbers.

### Question 4

A minority of the candidates did well on this question. A number of candidates used the correct `/*comment*/` syntax, many candidates submitting comments in html syntax.

### Question 5

The majority of the candidates saved the stylesheet and placed a copy in their evidence document.

## Website Authoring – HTML

### Question 6

Many candidates created the webpage structure as specified, although some added extra columns or set the **colspan** to a number greater than 3.

### Question 7

Many candidates attached the stylesheet to the webpage as specified. Despite this, a number of candidates attained this mark as many then added inline styles to their html or defined new styles in the head section after the attached stylesheet, which meant that the attached styles did not work as intended.

### Question 8

The majority of the candidates successfully inserted the image into the specified cell.

### Question 9

The data entry for this question frequently contained typographical errors. A small number of candidates entered the text with 100% accuracy and set the two different text elements within the cell into styles h1 and h2.

### Question 10

This question was completed well by the majority of the candidates. Most candidates entered the text accurately, although there were a number of variations on giraffe (like girrafe) and the sable antelope was added as a stable antelope or table antelope. Images were predominantly the correct images for the correct text. Some candidates omitted setting the style of the text as h2.

### Question 11

Recent changes to html have meant that images without alternate text attributes will not validate as html and therefore may not be displayed in all browsers. Most candidates added valid **alt** attributes to the four animal images but many candidates did not set a similar attribute for the banner. In a web based environment, where embracing change is fundamental to successful development, Examiners are aware of the added onus placed on candidates and while highlighting the importance of the changes, every effort will be made to minimise the effects on the candidates. Therefore, only a single mark was allocated for this skill.

### Question 12

The majority of the candidates completed this step successfully.

### Question 13

This question was completed well by many candidates. Several candidates created the opening part of the anchor '`<a... >`', but omitted the '`</a>`' close anchor statement. Some candidates used an absolute file path for the hyperlink reference which would not function correctly in most computers when the webpage was uploaded to a web server. A number of candidates did not set the target window as specified to "`_giraffe`", and there were many incorrect spellings of the word giraffe. A small number of candidates set up this hyperlink and the correct target window but did not create it from this image, some placing the `<a>` and `</a>` tags together so the link could not be accessed.

### Question 14

The majority of the candidates completed this step successfully. A number of candidates added their details in the correct cell without the text **Edited by**. The text entered was not always set into paragraph style.

### Question 15

A small number of candidates from a range of Centres did not correctly place the browser view as a Screenshot within their evidence document. Candidates must ensure that it is clear to the Examiner that this is a screenshot of their browser. If candidates crop the image so that this evidence is not visible to the Examiner, then no marks can be awarded for this.

### Question 16

The majority of the candidates successfully placed a copy of the HTML source in their evidence document.

### Data Analysis

### Question 17

The majority of the candidates completed this step successfully.

### Question 18

Many candidates completed this step successfully, although, on occasions, they did not always display the evidence of the full range of cells being selected.

### Question 19

A minority of the candidates answered this question well. The question required candidates to save this file as a spreadsheet. This should not have included csv format (which is a text format) or xml format which, although it can contain spreadsheets, is a markup language.

### Question 20

The majority of the candidates completed the data entry into both the header and footer successfully.

### Question 21

Most candidates successfully searched for the countries using Dollars or Pesos.

### Question 22

The sorting was completed with much less success than anticipated. A significant number of the candidates sorted on country name as the primary key sort with the currency relegated to the secondary sort rather than the other way around, as was specified in the question paper.

### Question 23

The majority of the candidates printed this extract successfully.

### Question 24

The majority of the candidates completed this step successfully.

### Question 25

A number of the candidates completed this step successfully. There were a number of typographical errors found, with **Quater 1** being a common mistake. A number of candidates had left and right transposed in their responses. Most candidates entered the text **Last edited on** but some omitted the text **at** between the date and time.

### Question 26

The majority of the candidates completed this step successfully.

### Question 27

The most common error was left aligning the text in the merged cell rather than centre aligning it. Some candidates did not set the text colour to a white sans-serif font. A small number of candidates were not able to add a black background.

### Question 28

Candidates frequently used a VLOOKUP or LOOKUP function for this question and generally scored well, but a number of alternative attempts were tried, particularly where candidates had anticipated a question involving nested IF statements. Most candidates used relative referencing and the named range created in **step 19** as part of their successful formulae. Replication of the formulae was frequently applied correctly.

### Question 29

The majority of the candidates successfully formatted the values in the specified column.

### Question 30

The majority of the candidates produced the required printout as specified.

### Question 31

This question required the candidates to produce a wildcard search for the word giraffe. Whilst many completed this step successfully, a number of candidates selected rows using 'starts with' as the criteria or selected using the drop down filter boxes to select the criteria by hand. A small number of candidates mistakenly deleted rows and did not select all the required rows.

A significant number of candidates did not sort this data into ascending order of country. Some candidates sorted the column headings into the data, and others selected only the single column for the sort so that the integrity of the data was lost. One repeated example of incorrect sorting, presented Examiners with an 'Ethiopia Giraffe' project taking place in Slovenia rather than in Ethiopia.

**Question 32**

The majority of the candidates completed this step successfully.

**Question 33**

A number of candidates completed this task successfully. This required the candidate to produce (and evidence) the correct calculations from the extracted data. The values spent on the Bali tiger project had to be totalled before the chart could be created. Candidates frequently selected a bar chart rather than a pie chart to compare the percentage values. The weakest area from a significant number of candidates was the labelling of the chart with appropriate labels, indicating that this was a comparison of projects in Indonesia.

**Question 34**

The majority of the candidates printed the evidence document.

