



Examiners' Report Lead Examiner Feedback

February 2023

Pearson BTEC Nationals
In BTEC Tech Award in Digital Information
Technology
Component 3: Effective Digital Working Practices

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What is a grade boundary?

A grade boundary is where we set the level of achievement required to obtain a certain grade for the externally assessed unit. We set grade boundaries for each grade, at Distinction, Merit and Pass.

Setting grade boundaries

When we set grade boundaries, we look at the performance of every learner who took the external assessment. When we can see the full picture of performance, our experts are then able to decide where best to place the grade boundaries – this means that they decide what the lowest possible mark is for a particular grade.

When our experts set the grade boundaries, they make sure that learners receive grades which reflect their ability. Awarding grade boundaries is conducted to ensure learners achieve the grade they deserve to achieve, irrespective of variation in the external assessment.

Variations in external assessments

Each external assessment we set asks different questions and may assess different parts of the unit content outlined in the specification. It would be unfair to learners if we set the same grade boundaries for each assessment, because then it would not take accessibility into account.

Grade boundaries for this, and all other papers, are on the website via this [link](#)

Introduction

This report has been written by the Lead Examiner of Component 3: Effective Digital Practices, the externally set exam paper for the BTEC Tech Award in Digital Information Technology qualification.

It is designed to help you understand how candidates performed in this examination. The report provides you with an analysis of candidate response to each of the questions in the examination paper, in addition, candidate responses, with commentaries, will be included.

Following the format outlined in the sample assessment materials, the previous papers, and the mock paper, published on the Pearson website, four scenarios were used for this assessment; each scenario was broken down into several questions which assessed a range of specification topics, covering all the learning aims outlined in the specification.

Candidates were expected to demonstrate knowledge and understanding of the specification topics and apply this knowledge to the given scenarios.

The extended questions were marked using a 'levels-based' approach to assessment, where the overall quality of the response was considered rather than the specific number of points gained. There was one diagram question included, this too was marked using a level-based approach.

The remainder of the questions on the paper, including the annotation question, were assessed using a 'points-based' approach.

Introduction to the Overall Performance of the Unit

Generally, candidates coped well with the content, requirements, and degree of difficulty of the examination paper, with some very good responses given to the more challenging questions.

However, as in previous series, some candidates often failed to read the questions carefully and provided responses which did not answer the question being asked, therefore not receiving marks.

Others failed to gain all the marks available on short response questions by not looking carefully at the number of marks available for a question. The marks shown in brackets on the paper indicate the number of points required in the response.

Some candidates coped well with the long answer questions, where clear and detailed answers relating to the scenario were required, but in many instances, candidates showed a lack of knowledge of the overall specification content with some blank responses.

As in previous series, some challenging handwriting was again evident in the candidate work, therefore it may be helpful to sample candidate handwriting prior to examination, so that a potential need for access arrangements can be identified.

Individual Questions

Section 1

The first scenario was based on a childcare organisation, Highchair Nursery, which had received a grant to purchase new laptops to replace its existing PCs.

Q1a

Candidates were provided with an example, a website, of a communication platform the nursery could use. Candidates were then asked to state two other communication platforms the nursery could use.

Most candidates stated two correct communication platforms. The most often seen correct responses were 'email' and 'social media', however, there were a few who responded with SMS, text message or just messaging.

Candidates were also awarded marks for suitable proprietary communication platforms such as Microsoft Team, Twitter, etc. in place of social media, VoIP and direct messaging.

In this example, the candidate was awarded 1 mark for response 1 'email communication', however, no mark was awarded for response 2 as 'text messages' is not a communication platform.

(a) A website is one communication platform the nursery could use.
State **two other** communication platforms the nursery could use. (2)

1. email communication

2. text messages

Here the candidate has stated two correct communication platforms, 'email' and 'direct messaging'. Two marks were awarded.

(a) A website is one communication platform the nursery could use.
State **two other** communication platforms the nursery could use. (2)

1. Email

2. Live messaging / direct message

Q1b

The next question expanded on the nursery's use of a website and asked the candidate to give two benefits to the nursery of using a website to communicate with its clients.

Overall, this question was not fully understood by candidates, with many responses relating to benefits to the client and not the nursery. Typical responses related to a website being easy, free, and easily updated.

Responses that gained marks included the 24/7 availability of a website, can be used for advertising and wider reach.

In this example, the candidate gave two correct benefits to the nursery, 'communicate globally' and 'communicate at any time (2/7, 365)' for 2 marks.

(b) Give **two** benefits to the nursery of using a website to communicate with its clients. (2)

1. They can communicate globally

2. can communicate at any time (24/7, 365)

However, here, for both response 1 and 2, the candidate has given benefits to the client and not the nursery, therefore, 0 marks were awarded.

This is an example of where candidates did not consider the scenario and did not answer the question being asked.

(b) Give **two** benefits to the nursery of using a website to communicate with its clients. (2)

1. Clients can use the website to get information ~~at~~ and news about the Nursery.
2. Clients have a high chance of finding the answers to their questions through the website.

Q1c

For this question, candidates were asked to identify two ways the nursery could dispose of its old PCs in an environmentally friendly way.

For this question, most candidates provided two correct responses to achieve the marks available. Most of the correct ways identified were recycling, selling and donating.

In this example, the candidate has identified that the PCs can be 'resold' and components 'reused' to achieve 2 marks.

(c) Highchair Nursery wants to dispose of its old PCs. Identify **two** ways the nursery could dispose of its old PCs in an environmentally friendly way. (2)

1. The PCs could be resold to individuals second hand
2. The PCs ^{components} ~~parts~~ could be extracted ~~and sold~~ ~~and recycled~~ and reused in other devices

However, some replies referred to disposing of the PC's but candidates did not actually identify a suitable way of disposal, as can be seen in this example, with 0 marks awarded.

(c) Highchair Nursery wants to dispose of its old PCs.
Identify **two** ways the nursery could dispose of its old PCs in an environmentally friendly way. (2)

- 1 take them apart - dispose of all different parts like plastic, metals
- 2 take them to a place where they take plastics and metals and dispose of pc's

Q1d

This question related to possible external threats to the nursery's laptops.

Candidates were given the example of malware, as a stimulus, and asked to state two other possible external threats.

Many candidates were able to recall correct responses and gained the 2 marks available. The most often seen responses were phishing, pharming and 'hacking'.

However, some candidates did not fully read the question and stated types of malware, as can be seen here, therefore, gaining no marks.

(d) The nursery is concerned about possible external threats to its laptops.
One external threat could be malware.
State **two other** possible external threats. (2)

- 1 worms
- 2 viruses

In this example, the candidate has stated two suitable examples of external threats, 'natural disasters' and 'man in the middle attack' to achieve 2 marks.

(d) The nursery is concerned about possible external threats to its laptops.
One external threat could be malware.
State **two other** possible external threats. (2)

1 natural disasters

2 man in the middle attack

Q1e

This was the first of the extended questions and followed on from malware as an example of an external threat.

Candidates were asked to describe how antivirus software can protect against malware.

Some candidates found this question difficult and as in previous series, confused the role of antivirus software with firewall software.

Where candidates were able to demonstrate their knowledge and understanding, marks were gained for responses such as scanning for malware, isolating files and alerting the user.

We can see in this example that the candidate has described the role of a firewall, with only 1 mark awarded for 'alert the user'.

(e) Describe how antivirus software can protect against malware. (4)

an antivirus software such as a firewall will monitor what goes in and out of the laptop. If (for example) a form of malware was found within the laptop it would alert the user to change what has been found.

In this example, the candidate has clearly demonstrated their knowledge and understanding of antivirus software. They have given 'scans programs on the PC', 'against a list of known threats', 'file will be isolated and removed' 'the user would then be informed'. 4 marks were awarded.

(e) Describe how antivirus software can protect against malware.	(4)	Q01e	4
<p>Antivirus software scans programs on the PC against a list of known malware. If a match is found, the file will be isolated and removed. The user would then be notified of this.</p>			

Section 2

This scenario concerned an online travel agency called AwayAgain Holidays.

The main focus of the questions in this section related to the staff working remotely.

Q2a

Candidates were asked to identify two benefits to staff of working from home.

The majority of candidates were awarded the two marks available for this question. The most often seen responses related to flexible working hours, saving on travel time and cost, better work life balance.

However, where candidates had not fully read the question, responses that would be benefits to the organisation were given, such as needing less office space.

In this example the candidate achieved a mark for the first response, 'removes travel cost', but no marks were awarded for the second response, as this was a benefit to the organisation, not the staff.

(a) Identify two benefits to staff of working from home.	(2)
1 removes travel cost	
2 no need for physical office or store	

The candidate in this example has identified two suitable benefits to staff of working from home, with 2 marks awarded.

(a) Identify **two** benefits to staff of working from home. (2)

1. There is no time or money wasted on travel.

2. Workers may find it easier ^{to work} and be more productive in their home environment.

Q2b

This question followed on from Q2a with candidates asked to explain one drawback for staff working of from home.

Most candidates identified correct drawbacks such as loneliness, increased household bills, distractions, and went on to include an appropriate explanation of these drawbacks.

However, as with Q2a, some candidates did not fully read the question and explained drawbacks to the organisation and not the staff, such as the organisation not being able to monitor the staff.

In this example, the candidate refers to staff becoming lazy as they do not need to go to work. 0 marks awarded.

(b) Explain **one** drawback for staff working from home. (2)

working from home could promote laziness as the worker doesn't need to go outside to work therefore can become lazy.

In this example, the candidate has identified the drawback of 'uses up more electricity' and expanded this with 'this means the bills will cost more for staff', to achieve 2 marks.

(b) Explain **one** drawback for staff working from home. (2)

It uses up more electricity when at home. This means the bills will cost more for the staff.

Q2c

This was an annotate question, with a possible 4 marks available.

Candidates were told that one of AwayAgain's staff had received an email claiming to be from her bank.

Candidates were provided with an example of why the email may not be genuine and asked to annotate the image to state four other reasons why the email may not be genuine.

Many candidates achieved the full 4 marks available for this question and clearly showed their understanding of what may constitute a phishing email.

There were a few candidates who had not fully read the question or examined the image and provided the given example as a response, and lost marks.

In this example the learner has annotated the image as follows:

- Email - 'suspicious email'
- 'u' - 'poor spelling'
- 'you' - 'poor spelling'
- Closure - 'informal'

Dear Customer was identified as 'poor grammar', but this is incorrect. Nonetheless, four correct reasons were given and 4 marks were awarded.

(c) One of AwayAgain's staff has received an email claiming to be from her bank.
Annotate the image to state **four** reasons why she may think the email is not genuine.
An example has been provided. (4)

From: help@fraudsquad.google.org

To: Betty Morris

Date: 29 June 2022

Subject: Confirm your Details

Dear Customer

We are writing to you to let you know that there is a problem with your log in to your online bank account. To make sure that their correct, we just need you to confirm that the information we have for you is correct and up to date.

Please follow this link to confirm your details [Update Details](#)

Cheers

Customer Services

Fraudsquad Bank

Handwritten annotations:

- a suspicious email address (pointing to the 'From' field)
- poor gram-mar (pointing to 'Dear Customer')
- informal, words/phrases used for a bank or inappropriate (pointing to 'Update Details')
- A bank would not ask you to confirm your details using a link. (pointing to the 'Update Details' link)
- poor spelling (pointing to 'Fraudsquad Bank')

Here the candidate has provided two correct reasons why this may be a phishing email:

- Email – ‘the email doesn’t look genuine’
- Cheers – ‘the language doesn’t sound profetional’

The candidate also annotated Customer Services as ‘no real persons name...’ and Fraudsquad Bank ‘...which isn’t a genuine name’, both of which are incorrect. 2 marks were awarded.

the email doesn't look genuine

From:	help@fraudsquad.google.org
To:	Betty Morris
Date:	29 June 2022
Subject:	Confirm your Details

Dear Customer

We are writing to u to let u know that there is a problem with your log in to you online bank account.

To make sure that their correct, we just need you to confirm that the information we have for you is correct and up to date.

Please follow this link to confirm your details [Update Details](#)

Cheers
Customer Services
Fraudsquad Bank

A bank would not ask you to confirm your details using a link.

these is no real persons name the email is sent by meaning it could be a system

the name is fraudsquad which isn't a genuine name of a bank

the language doesnt sound professional formal sounds

Q2d

For this question candidates were told that staff use a messaging app to communicate with each other.

They were asked to explain two benefits to staff of using a messaging app to communicate, for 4 marks.

This was not a well answered question with few candidates achieving the full 4 marks available. Awardable benefits concerned the messaging app's use in a work environment, such as security (encryption), status settings, record of messages, working collaboratively and notifications.

However, many candidates did not fully understand what the question asked, and provided generic responses such as speed, cost, ease of use and can be used on different devices.

This response was awarded 1 mark for response 1 - 'saving the sender individually telling multiple people' (no need to repeat information),

however, this was not correctly expanded further to access the additional mark. No marks were awarded for response 2.

(d) Staff use a messaging app to communicate with each other.
Explain **two** benefits to staff of using a messaging app to communicate. (4)

- 1 It means more people can see the same information at once, saving the sender individually telling multiple people.
- 2 It is quicker as the sender does not need to travel around the office to find the people they need to tell.

Here the candidate was awarded 1 mark for response 1 – ‘allows the staff to discuss ideas’, implying collaborative working. However, no marks were awarded for response 2, as it is again related to collaborative working.

(d) Staff use a messaging app to communicate with each other.
Explain **two** benefits to staff of using a messaging app to communicate. (4) Q02d

- 1 One benefit of staff using a messaging app to communicate is able to communicate quickly. This allows the staff to discuss ~~items~~ ideas.
- 2 Another benefit is ~~it~~ able to improve their working. This means that they can ~~gain~~ gain ideas or feedback to improve.

Section 3

The scenario for this section was Help a Heart charity which raises money for life-saving research. It also explained that the charity had high street shops where people could donate and purchase items.

Q3a

The first question in this section concerned an IT Acceptable Use Policy, the charity had, which included the use of work email accounts by staff.

The question expanded to state one example of a rule of the policy was that staff must not use their work email account to bully or harass.

Candidates were asked to explain one other rule for using their work email account that could be included in the policy.

Most candidates achieved a mark for this question with the often seen response of staff not to use their work emails for personal uses, but few expanded on this for the additional mark available.

The candidate in this example achieved the full 2 marks available for, 'no inappropriate language' and 'so that the company maintains a good, friendly reputation'

(a) The charity has an IT Acceptable Use Policy, which includes the use of work email accounts by staff.

One rule of the policy is that staff must not use their work email account to bully or harass.

Explain **one other** rule for using their work email account that could be included in the policy.

(2)

One other rule should be that no inappropriate language should be used when using the email so the company maintain a good, friendly reputation.

In this example the candidate achieved 1 mark for ‘... not use their work email for personal issues’, but did not expand on this for the second mark.

(a) The charity has an IT Acceptable Use Policy, which includes the use of work email accounts by staff.

One rule of the policy is that staff must not use their work email account to bully or harass.

Explain **one other** rule for using their work email account that could be included in the policy.

(2)

Another rule of the Policy is that staff must not use their work email for personal issues.

Q3b

For this question the candidate was told that the charity is trying to be more environmentally friendly and save on resources.

The question related to usage and settings policies and the candidate was asked to explain two policies that the charity could use.

Generally, this question was well answered by candidates, with many correct responses seen relating to power saving settings, auto-power off/turn off and the use of digital copies.

In this example the candidate was awarded 4 marks. Marks were awarded for ‘turn off your PC’, ‘when you are not using it’, ‘have the brightness turned down’, ‘to save energy’.

(b) The charity is trying to be more environmentally friendly and save on resources.

Explain **two** usage and settings policies it can use to help it do this.

(4)

1 it can have a policies that says that you should turn off your PC when you are not using it. this saves energy.

2 they can also have the brightness turned down a bit on the computers this also saves energy.

Some candidates were confused by the question and provided responses relating to the disposal of equipment, recycling equipment and general environmental issues rather than usage and settings to save on resources.

In this example the candidate has misunderstood the question and the response relates to resources being recycled and the reduced use of software. No marks were awarded.

(b) The charity is trying to be more environmentally friendly and save on resources.

Explain **two** usage and settings policies it can use to help it do this. (4)

1 They could introduce a policy about recycling. For example all resources used that can be recycled should be recycled.

2 They could set a limit on how much you use a certain software. For example they wouldn't want to ~~waste~~ waste resources when they aren't needed

Q3c

This question related to the charity sharing its donor and donation data with the head office.

Candidates were asked to explain two drawbacks of sharing this data for 4 marks.

Few candidates were awarded the full marks available but many did achieve at least two marks. These marks were generally gained from responses such as data could be intercepted and leaked/stolen. Some candidates recognised the possible legal drawbacks such as DPA/GDPR and the resulting financial implications.

The candidate in this example achieved 2 marks for 'could be illegal' and 'could be sued', both in response 2. No marks were awarded for response 1.

(c) Staff at the shops record data about the donors and the donations received.

This data is shared with the charity's head office.

Explain **two** drawbacks of sharing this data.

(4)

1 This data could consist of personal information which, if shared, may be a punishment to the donor.

2 sharing this information could also be illegal if they do not have permission to share, this could result in the company being sued for sharing personal information

This candidate also achieved 2 marks for 'a hacker might try to see the information', 'to steal it'. Both marks were awarded for response 1, no marks were given for response 2.

(c) Staff at the shops record data about the donors and the donations received.

This data is shared with the charity's head office.

Explain **two** drawbacks of sharing this data.

(4)

1 Data could one drawback of sharing data is that when sharing it a hacker might try to see who the information to steal it ^{so they can find who} and take their ~~money~~ sent the money so they can try to take their ^{money} ~~money~~.

2 the file another is that the file could get corrupted so they could lose the data.

Q3d

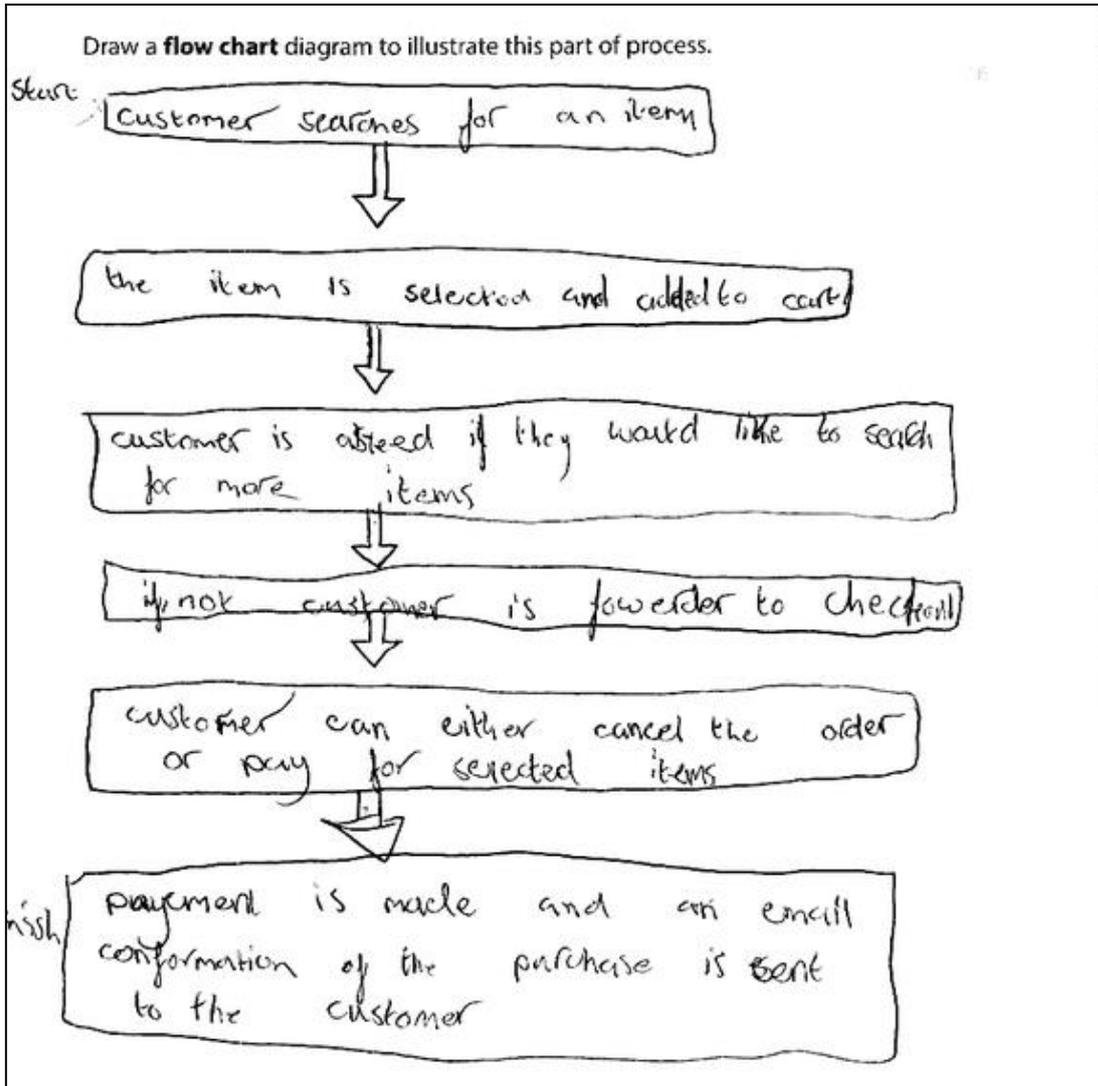
This was the 'draw' question, the first of the levels-based mark questions with a total of 6 marks available to candidates.

An example process was provided, and candidates were asked to draw a flowchart to represent this.

Most candidates expressed the logical flow using the correct shapes, flow lines and annotations, with 6-mark responses, very much like the example given on the mark scheme. However, some candidates did not know how to construct a flow chart and provided a system flow diagram or an information flow diagram.

Poor responses typically listed all the stages with lines in-between.

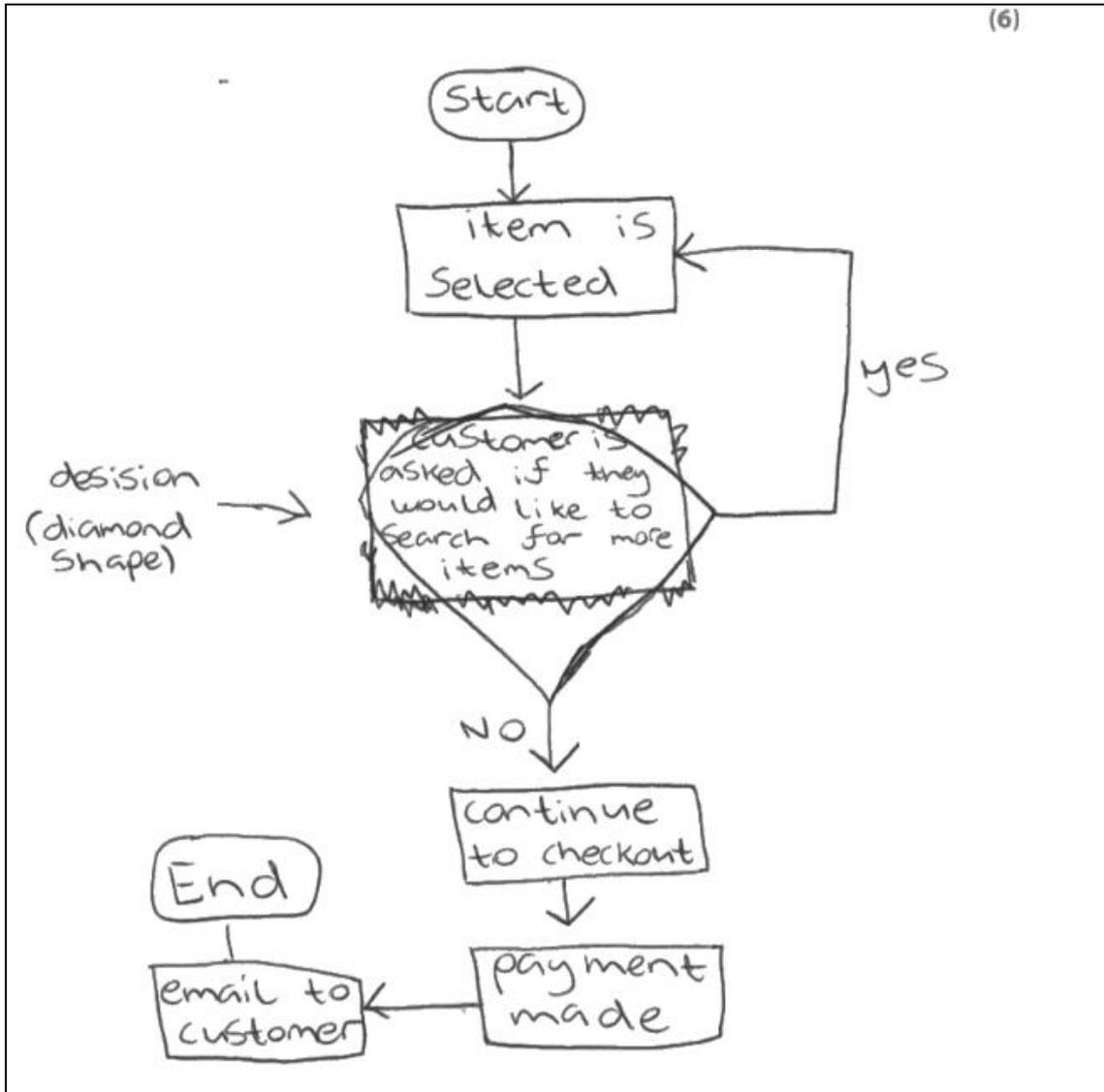
As seen in previous series, this first example shows that the candidate has copied the process directly from the paper and put the steps in boxes. This is not a flow chart and was not awarded any marks.



In this example, the candidate has provide partial coverage of the appropriate notations and partially meets the requirements of the scenario, which meets the descriptors for Mark Band 1.

Mark Band 1 descriptors:

- Diagram provides partial coverage of appropriate notation with limited connections.
- Diagram partially meets the requirements of the scenario.

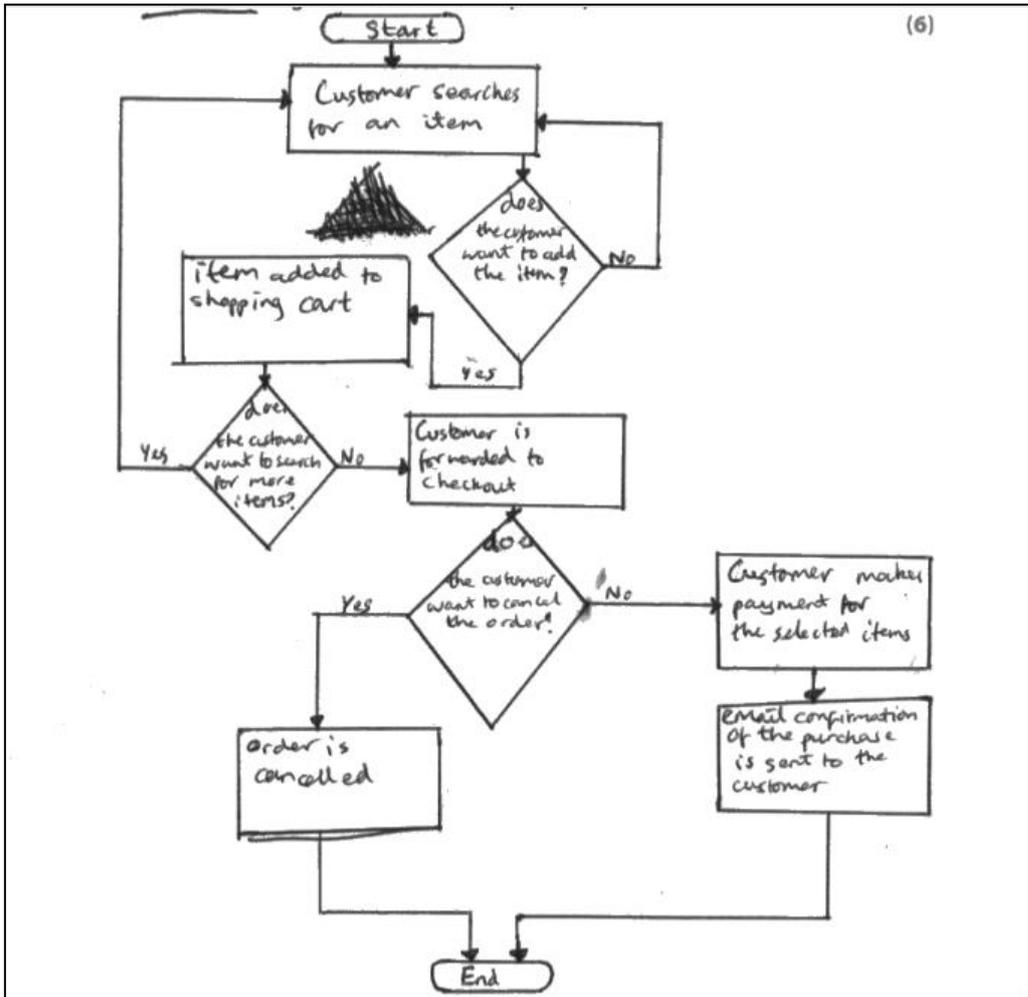


The candidate in this example has clearly understood the process described and had developed a diagram that mostly covers the appropriate notations and meets most of the requirements of the scenario, which meets the descriptors for Mark Band 3.

Although there are some differences, in terms of additional decisions, these are nonetheless appropriate.

Mark Band 3 descriptors:

- Diagram provides most coverage of appropriate notation with most connections.
- Diagram meets most requirements of the scenario.



Section 4

For section 4 the scenario related to Parandam, which was a company that designed and made unique pieces of jewellery.

Candidates were told that the company stored its jewellery designs and customer data on its digital system.

Q4a

This question related to the possible impact of a security breach on the company. As a stimulus, candidates were given data loss as an example impact of a security breach.

Candidates were asked to explain one other impact of a security breach for the company.

Many candidates were able to apply their knowledge and understanding of the topic, achieving the two marks available. The most popular responses related to the company's loss of reputation, mistrust/loss of customers and financial loss.

However, a significant number of candidates responded with data loss, which was the example given in the question, as can be seen in this example i.e. 'the designs are stolen...'

(a) A security breach would have an impact on the company.
 One possible impact of a security breach would be data loss.
 Explain **one other** impact of a security breach. (2)

Another impact could be that the designs are stolen and replicated by other businesses. Hackers/other businesses, this would be detrimental to the company.

In the following example, the candidate has been awarded two marks for 'break the Data Protection Policy' and 'legal issues'. The candidate also referred to the loss of reputation, however the two marks available had already been achieved.

(a) A security breach would have an impact on the company.
 One possible impact of a security breach would be data loss.
 Explain **one other** impact of a security breach. (2)

They would break the Data Protection policy, therefore they will also have some legal issues to go through, ruining the reputation of the company.

Q4b

This question centred on the benefit of net neutrality, specifically for small businesses. Candidates were asked to describe how net neutrality could benefit small companies.

Very few candidates achieved marks for this question. There appeared to be little knowledge or understanding of net neutrality, with the majority of responses related to issues such as increased profit, increased growth, protect from hackers.

Correct responses referred to internet traffic being treated equally but few candidates were able to expand on this for additional marks.

This candidate achieved two marks for 'big companys cant pay to have their websites sped up' and 'and others slowed down'. Referring to the fact that wealthier companies must not be favoured over those who cannot afford to pay and that internet speeds must not be slowed down/throttled.

Describe how net neutrality can benefit small companies. (3)

Net neutrality can benefit small companies as it means big companies can't pay to have their websites sped up and others slowed down which the smaller companies would not be able to afford to do so it gives the smaller companies a chance over the bigger companies.

Q4c

This question concerned the company's digital system which was kept on-site at the company's premises and is another levels-based mark question.

Candidates were told that user access security was important to protect the company's digital system and then asked to discuss the user access restriction methods the company could use.

Overall, candidates were able to demonstrate their knowledge and understanding of user access restriction methods, however, not always as a discussion.

Some candidates listed the methods, without expanding further on their use. Passwords, levels of access, 2FA and biometrics were the most common access restrictions discussed.

This example of a Mark Band 1 discussion, appears to relate to two factor authentication, while the candidate has not mentioned this method by name, it is what they are implying and they understand how it works.

Mark Band 1 descriptors:

- Demonstrates isolated elements of knowledge and understanding, with major gaps or omissions.
- Few of the points made will be relevant to the context in the question.
- Limited discussion which contains generic assertions rather than considering different aspects and the relationship between them.

Discuss the user access restriction methods the company could use.

(6)

Another user access they can use is conformation because if someone try to get in ~~a~~ ~~string~~ the digital system they will get a conformation email and see if people are trying to get in.

This is another Mark Band 1 response. The candidate has provided a list of user access restriction methods, however there is no clear discussion about their use.

Discuss the user access restriction methods the company could use.

(6)

the company could lock the doors to the computers so that only certain users can access them. they could use biometrics eg. fingerprint or a retina scan. They could use a multi-step verification where they have two or more steps to verify, for example a pin or password. They could just have a pin or password on their own. The computers could have a screen time limit or are only available at certain times to limit the amount of people able to log on. they could use a firewall so that certain things are blocked and inaccessible.

This is an example of Mark Band 3 work. The candidate has demonstrated their knowledge and understanding by including a well-developed discussion covering a range of appropriate user access restriction methods.

Mark Band 3 descriptors:

- Demonstrates mostly accurate and detailed knowledge and understanding.
- Most of the points made will be relevant to the context in the question, and there will be clear links.
- Displays a well-developed and logical discussion which clearly considers a range of different aspects and considers how they interrelate, in a sustained way.

4.c

The company could use biometrics such as finger print to access the digital systems room which means that it could only be accessed with an authorised member of staff present. this means that they are at least sure that nobody can get in without a member of their staff present which eliminates any external theft possibility. biometrics is expensive though but is the most secure out of them all especially if they combine it with other methods such as username and password which would require the staff member to enter a username and password and then their biometric. A username and password restriction method could be good if the password is secure but this could also be bad as secure passwords are hard to memorise. a combination of biometrics and usernames and passwords could be very useful to ensure user data is protected and would be worth the investment to avoid repuation and financial loss. another method would also be two factor authentication which is when a code is sent to your email everytime you login to prove that

it is you that is there but the intruder could have access to your email so this method might not work as well. there is also a key that could be used by that key could be stolen or employees could make multiple cuts of the key incase they get fired so this might not be the most secure method but it is the cheapest. Another method would be staff lanyards which is also cheap but can easily be lost or stolen. The best overall option for Paradam would be a username and password system that is then verified by a biometric such as a finger print. this would require a username and password to be typed in by an employee and then have them scan their fingerprint. this would make it difficutl for people to break in and steal data or trade secrets or cause sabotage to their digital system.

Q4d

This was the last question and the final level mark question.

It expands the scenario further with Parandam considering using cloud technologies to store and backup it's data.

Candidates were asked to assess the factors the company should consider when choosing cloud technologies.

A significant number of candidates misunderstood the question and presented features and the benefits and drawbacks of cloud storage and backup, such as needing internet, that it is available 24/7, accessibility features, collaboration, availability on devices.

Whereas, expected responses should have centred on factors such as disaster recovery, security, compatibility, storage, maintenance, customer support, implementation, downtime, performance, training and cost.

Many candidates included factors such as storage and scalability, automatic backup, where the data would be stored and security, although not always in the context of the question. Where candidates had understood the context, many relevant responses were seen.

In this example the candidate talks about internet 24/7 which is not relevant to the question. However, they do mention automatic backup, which is part of disaster recovery considerations, but their reponse is not in this context. They also talk about storage and whether this is scalable, which is relevant to the scenario.

There is isolated knowledge, only one of the points is relevant and it is a limited assessment, therefore, the candidate work meets some of the descriptors for Mark Band 1.

Mark Band 1 descriptors:

- Demonstrates isolated knowledge and understanding, there be major gaps or omissions.
- Few of the points made will be relevant to the context in the question.
- Limited assessment which contains generic assertions rather than considering the factors or events and their relative importance, leading to a conclusion which is superficial or unsupported.

One factor the company must consider when choosing cloud technologies is that the cloud requires internet. ~~cloud~~ The cloud requires internet 24/7. You must have internet to access the cloud.

One other factor the company must consider when choosing cloud technologies is that the cloud backs up ~~the~~ all the time automatically, ~~and~~ ^{it} backs up to ~~other~~ ^{their} backup units so there is always a backup if you accidentally delete anything, ~~or~~ ^{if} you get hacked it's all backed up.

Another factor the company must consider while choosing cloud technologies is that the cloud is scalable. This means if you run out of storage on the cloud you could upgrade your storage plan. The storage plan is ~~always~~ ^{conceivable} this means you can ~~conceivable~~ anytime you want.

This candidate has understood what was asked for in the question.

They have identified relevant factors such as price, extra features (Office 365), capacity (storage) and maintenance.

They have expanded somewhat on these factors and have provided a logical but not a well-developed assessment. However, there are some weaknesses in the consideration of the factors.

The work meets some of the descriptors for Mark Band 3.

Mark Band 3 descriptors:

- Demonstrates mostly accurate and thorough/detailed knowledge and understanding.
- Most of the points made will be relevant to the context in the question, and there will be clear links.
- Displays a well-developed and logical assessment which clearly considers the factors or events and their relative importance, leading to a supported conclusion.

Upon choosing which cloud technology ⁽⁹⁾ they must use ~~using~~ to store their data, they have to consider a number of factors before coming to a conclusion.

Some of these factors will include things ~~like~~ like price, capacity, accessibility and maintenance. When looking into price, they must assess which cloud technology would be in their budget, so they don't overpay. Also, some tech has a smaller price than others, but that comes down to another factor - the capacity. Depending on how much data they are looking to store, they should choose a capacity that suits them, a terabyte for example. Now, the ~~cost~~ accessibility point of view all links down to the price.

Depends if they need a basic cloud server that anyone from the company can access or something more advanced, like Office 365 for example which includes cloud software too. It would be easier and cheaper to have a basic ~~cloud~~ cloud server, as it will only be used for data. And now, the maintenance. They don't have to worry about that, as companies usually ~~at~~ maintain the ~~servers~~ servers themselves so it's fine.

Summary

As previously mentioned in this report, candidates generally performed well in this series.

It is recommended that candidates should:

- Ensure that they read the questions thoroughly.
- Be guided to look for example responses given in questions.
- Relate their responses to the scenario that has been given for each section.
- Understand the requirements of the command verbs typically used in this paper, specifically the extended questions e.g.
 - **Explain** – this requires candidates to identify an example and expand to provide a linked explanation e.g., lower maximum data transfer speed (1) because they use a shared connection (1)
 - **Describe** – this requires candidates to provide a set by step description, generally a step for each mark available e.g. create to do lists (1) and set deadlines (1) then activate reminders (1)
- Plan the structure of their responses for the extended 6 mark and 9 mark questions, to ensure that there is no repeated information in their responses, this will help to keep their answers focused.
- Ensure that where implications are asked for, that both benefits and drawbacks are considered.
- Sample assessment materials (SAMs) and previous exam materials are located on the BTEC Tech Award in Digital Information Technology qualification webpage located [here](#).



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