



# **Examiners' Report** **June 2022**

**IAL Psychology WPS02 01**

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## Introduction

Candidate entry increased for the May 2022 series, so a wide range of responses from candidates were seen.

Application for AO2 responses was an area that remained difficult for candidates with answers often being generic.

Long answer questions remain challenging with candidates often lacking detail either in their knowledge and understanding or with their ability to develop their arguments for the AO3 element which often limited the marks to the lower level mark bands.

## Question 1 (a)

This was usually answered well. Most candidates referred to environmental cue regulating biological rhythms. In some answers, biological rhythms were not referred to.

1 (a) Define what is meant by the term 'external zeitgeber'.

(1)

An environmental cue that synchronises a biological rhythm.



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Examiner Comments

This response gained 1 mark for a clear definition that the environmental cue helps synchronise biological rhythms.

## Question 1 (b)

Candidates had to demonstrate AO1 and AO3 to explain two strengths. The most popular strength was Siffre's study.

Good answers were able to identify two strengths, but only the very best went on to justify those strengths. Weaker answers often described external cues and their effects on the sleep-wake cycle. A minority of answers did not focus on the sleep-wake cycle.

(b) Explain **two** strengths of the role of external zeitgebers in explaining the regulation of the sleep-wake cycle.

(4)

1 Siffre's (1972) study where he went into hiding for 6 months, without any external cues such as light, proves that in the absence of light, the sleep-wake cycle increased to 48 hrs.

2 Zhang et al (2006) found that giving mice with a rare variance in the circadian clock gene, light at different times of the day, affected their sleep-wake cycle, proving that light is important in regulating the sleep-wake cycle.

(Total for Question 1 = 5 marks)



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Examiner Comments

This response gained 3 marks.

1 mark for the first strength for identifying the results of Siffre's study. There is no explanation of why this is a strength so it cannot get the second mark for the justification/exemplification.

2 marks for the second strength. 1 mark for identifying the results of Zhang et al. study. 1 mark for the explanation that it proves that light is important in the sleep-wake cycle.

(b) Explain **two** strengths of the role of external zeitgebers in explaining the regulation of the sleep-wake cycle.

(4)

1 The external zeitgebers play a major role in the menstrual cycle by helping in synchronising and regulating a woman's menstrual cycle.

2 The external zeitgebers also help in regulating and synchronising someone's sleep cycle.



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Examiner Comments

This response did not gain any marks as the first strength is not focussed on the sleep-wake cycle and the second strength is describing the role of external zeitgebers.



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Examiner Tip

Read the question carefully and ensure you are answering the question that is asked.

## Question 2 (a)

Most candidates were able to write a null hypothesis to gain at least one of the AO2 marks. However, very few answers were fully operationalised with most failing to operationalise the dependent variable. Weaker answers failed to operationalise either the independent variable or the dependent variable.

2 Harrison conducted an experiment into the effect of antidepressants on people who had seasonal affective disorder. He allocated his participants into one of two different conditions.

- Condition A: Given antidepressants.
- Condition B: Not given antidepressants.

Harrison asked all the participants to record their mood in a daily diary for a month. He used a rating scale from 1 (happy mood) to 7 (low mood). When he had collected the data, Harrison then calculated an average mood score for each participant over the month.

(a) State a fully operationalised null hypothesis for Harrison's experiment.

There is no significant difference <sup>the average(2)</sup> between <sup>on a rating scale from 1-7</sup> mood scores recorded in a daily diary for a month <sup>by people</sup> who had seasonal affective disorder between those who were given antidepressants and those who were not given anti-depressants.



This response gained 2 marks for a fully operationalised null hypothesis that mentions the two groups, on antidepressants, or not, for the independent variable, and the mood scale from 1-7 for the dependent variable.



When asked to write an operationalised hypothesis, ensure that both the independent and dependent variable are fully operationalised.



(a) State a fully operationalised null hypothesis for Harrison's experiment.

(2)

~~When the participants receive ant:~~

There is no significant difference between those who received antidepressants and those who were not given, on the average mood score for each participant in Harrison's experiment over the month.



**ResultsPlus**  
Examiner Comments

This response gained 1 mark as the null hypothesis is partially operationalised – as how mood is measured is not operationalised. There should be reference to the scale of 1-7.

### **Question 2 (b)**

Most candidates could correctly calculate the mean.

### **Question 2 (c)**

Most candidates could correctly identify the median.

## Question 2 (d)

Only the very best answers demonstrated an understanding that the standard deviation showed the spread of scores and were able to use this understanding to explain what the two standard deviations demonstrated.

Good answers were able to gain a mark for identifying the difference in the standard deviations. A large number of answers failed to gain any marks as they wrote about the standard deviation showing which group had the highest mood score.

- (d) Harrison calculated the standard deviation for both conditions. The standard deviations are shown in **Table 2**.

Standard deviation for condition A: Participants were given antidepressants	Standard deviation for condition B: Participants were not given antidepressants
1.03	1.21

**Table 2**

Explain what the standard deviations show about Harrison's results.

(2)

PARTICIPANTS THAT WERE NOT GIVEN ANTIDEPRESSANTS  
SCORED HIGHER THAN THE PARTICIPANTS THAT WERE  
GIVEN ANTIDEPRESSANTS.



This response gained 0 marks.

There needs to be some link to standard deviation. From this answer, we do not know what the participants scored higher in. It is lacking detail.

(d) Harrison calculated the standard deviation for both conditions. The standard deviations are shown in **Table 2**.

Standard deviation for condition A: Participants were given antidepressants	Standard deviation for condition B: Participants were not given antidepressants
1.03	1.21

**Table 2**

Explain what the standard deviations show about Harrison's results.

(2)

*the data in condition B shows that patients who did not have antidepressants had a ~~lower~~ used score that deviated more from the average while condition A deviated less*



This response gained 1 mark for identifying that those who did not have antidepressants deviated from the average more than those who did have antidepressants.

There is no further explanation so the response cannot get the second mark.



For 'explain' questions, remember to include the justification or exemplification for the second mark.

## Question 2 (e)

This question required candidates to apply the context to gain an AO2 mark for identifying a weakness and then go on to justify/exemplify this weakness for the AO3 mark.

The very best answers were able to do this. Some answers were able to gain the AO2 mark as they were able to identify a weakness, but they did not go on to justify why this was a weakness. Weak answers often did not gain any marks as they did not apply their answer to details from the context.

(e) Explain **one** weakness of Harrison's experiment.

(2)

One weakness is the sample number  
is low to be able to generalise the  
findings ~~the~~ he could increase the number be ~~to~~ 20  
~~which~~ which will add ~~sum~~ to the sum of participant which  
will be 32 and place 16 in Condition A and 16 in  
Condition B



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Examiner Comments

This response gained 0 marks as it is generic.

There is no specific link to the scenario. Condition A and Condition B is not enough to get the application mark.



**ResultsPlus**  
Examiner Tip

When answering an application question, always include details from the context given.

(e) Explain **one** weakness of Harrison's experiment.

(2)

Harrison did not screen the participants to check if they ~~is~~ maybe receiving light therapy ~~at~~ prior or during the experiment. Participants ~~was~~ in condition A may be receiving light therapy and the mood score may not reflect the true effect of the antidepressant drug. Thus reduces <sup>the</sup> validity of the experiment.



**ResultsPlus**  
Examiner Comments

This response gained 2 marks.

1 mark for identifying that Harrison did not screen his participants to see if they were getting light therapy.

1 mark for explaining how the mood score may have been due to light therapy, so the results may reflect the true effect of antidepressants. There is a clear exemplification of the weakness in this answer.

### Question 3 (a)

This was a 'describe' question where candidates gained AO1 marks for describing the results of Raine et al.

The very best answers were able to gain three marks for describing three different results from the study. However, a lot of answers were list-like with no further description of the results, so limiting the marks they could gain.

(a) Describe the results of the classic study by Raine et al. (1997).

(3)

Raine et al. found that NGR1 murderers had less <sup>brain</sup> ~~neocortical~~ activity in the prefrontal cortex which is largely associated with judgement and decision making. They also found a lack of activity in the corpus callosum, meaning there was less communication between hemispheres than control group. There was also increased activity in the occipital ~~to~~ lobe which ~~was~~ processes visual information.



This response gained 3 marks for three clear results from the study that are described and not just listed.



When answering 'describe' questions, candidates should give an account of something with the statements needing to be developed.

Candidates should refer to the taxonomy of terms throughout their studies, so they know the requirements of different questions.



### Question 3 (b)

Candidates were expected to identify a strength and weakness for the AO1 marks and then justify or exemplify why they were a strength or weakness for the AO3 mark.

The best answers were able to do this with the most common strength being the matching of the control group to the NGRIs. The most common weakness were issues with the sample.

A lot of answers were able to identify a strength and a weakness, but failed to gain the AO3 mark through a lack of justification/exemplification. The weakest answers were generic with no reference to details from the study in question, and could have referred to a variety of studies.

(b) Explain **one** strength and **one** weakness of the classic study by Raine et al. (1997).

(4)

#### Strength

The control group was closely matched to the participant group in that the control group consisted of 41 people of the same gender and similar age and consisted of 6 schizophrenic patients to pair with the 6 schizophrenic murderers. This eliminated any participant variables that could have come about, thereby making the findings valid.

#### Weakness

The findings of the study was not generalizable as the participant group consisted of only murderers and only 2 females. This means the sample was not representative of other offenders and female offenders.





This response gained 4 marks.

2 marks for the strength. 1 mark for identifying that he matched the control group on age gender and schizophrenia and 1 mark for the elaboration that this eliminated possible participant variables so the experiment is more valid.

2 marks for the weakness. 1 mark for identifying that it is not generalisable as the sample consisted of murderers and only 2 females and 1 mark for the elaboration that it is therefore not representative of other offenders and female offenders.

## Question 4 (a)

The requirements of this question were AO2 marks, so the answer had to be applied to details from the context throughout.

Most answers were able to gain a mark for describing how the aggression score could be collected, but only the best went beyond this describing how the cortisol could be measured and including other procedure points such as how the sample could be collected and linking it to the scenario.

Answers often failed to describe how the cortisol score could be measured, and just repeated the stem. Some answers described an experiment rather than a correlation, and some answers measured other hormones rather than the cortisol referred to in the context.

4 Meryl has decided to carry out an investigation to determine whether there is a relationship between hormones and aggression. She gathered 13 participants through volunteer sampling. Meryl measured the participants' cortisol levels and how aggressive they had been over the past week.

(a) Describe the procedure Meryl could have used for her investigation.

(4)

Meryl should split the participants into two groups for which one group shall be administered with hormone blockers and the other ~~other~~ group isn't. By doing so over a period of four weeks Meryl should record ~~the~~ the aggressiveness of ~~part~~ the group administered with hormone blockers ~~oppose~~ to the group ~~not~~ administered with hormone blockers to see the ~~decrease~~ difference in ~~beve~~ aggression due to ~~to~~ a change in hormone levels.



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Examiner Comments

This response gained 0 marks as they are describing the procedure of an experiment, not a correlation.



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Examiner Tip

Candidates should focus on the question asked in their answer.

(a) Describe the procedure Meryl could have used for her investigation.

(4)

- Meryl could have asked her participants to fill in a form, where they rated how aggressive they were socially, and physically on a scale of 1 to 5 at the end of every day.
- At the same time, <sup>they submit themselves for this,</sup> she should take blood samples for analysis on their cortisol levels.
- ~~Then she can add average the scores they rated themselves~~
- She should also ask the participants' colleagues to rate how aggressive they were that day to improve inter-rater reliability.



**ResultsPlus**  
Examiner Comments

This response gained 3 marks.

1 mark per paragraph which is clearly describing the procedure of the study with each paragraph clearly linked to details from the context.



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Examiner Tip

For application questions, candidates should link each sentence to details from the context.

#### Question 4 (b)

The best answers were able to correctly identify if the correlation was significant and then use the critical values table to justify their answer.

Some answers failed to get the justification/ exemplification point. Some answers demonstrated an inability to use critical and calculated values to determine significance.

## Question 5

This essay required candidates to demonstrate their knowledge and understanding (AO1) and then apply that to the context (AO2).

There was some good knowledge and understanding of how different brain areas were related to aggression, with the best answers being able to then apply this to different aspects from the context as their discussion.

The best answers gave accurate and thorough knowledge and understanding and well-developed discussion. A lot of answers only partially developed their discussion. Some candidates put AO3 in their answer which was not creditworthy. The weakest answers showed limited knowledge and understanding, sometimes repeating the same point, with little or no reference to evidence from the context, often just using the name with no further details.

- 5 Sylvester has lost his job as a security guard at a shop due to his aggression. He had previously been verbally aggressive to customers, and in the latest incident kicked a customer after he had thrown them out of the shop.

Sylvester is currently single. His last relationship ended after he shouted at his partner. He has been banned from watching his local football team after he was involved in a fight with supporters of a rival team.

Discuss how brain functioning could account for Sylvester's aggression.

A01 - 4  
A02 - 4

You must make reference to the context in your answer.

(8)

Sylvester might have damaged his prefrontal cortex of the brain which mainly coordinates ones anger management, impulse control and problem solving skills. Being verbally aggressive to customers kicking the customer might be because of the damage of the prefrontal cortex.

Also damages to the right side of the amygdala caused a person to increase negative emotions. This might be the reason for Sylvester to shout at his partner resulting to end his relationship. Damages to the right side will lower ~~your~~ Sylvester's patience and also the ~~anger~~ decision making abilities.

Also the Amygdala is the part of the brain that controls emotions such as fear. Damages to the amygdala can reduce one's fear for an unlawful act. Therefore fighting with the supporters of the rival team might



be due to lack of fear for a <sup>incidence.</sup> ~~unacceptable~~  
~~act~~ which might <sup>happen</sup> because of the damage to  
the amygdala.

The ~~#~~ hypothalamus is another part of  
the brain that controls aggressive behaviour.  
Hypothalamus mainly controls the secretion of  
hormones such as testosterone. <sup>which is responsible for aggression</sup> So more testost  
-rone will be produced in the testes and  
more testosterone will release from the adrenal  
gland. Therefore, Sylvester might have been  
more aggressive and as a consequence of  
the aggressiveness he might have lost his  
job.

In conclusion, damages to the prefrontal  
cortex, damages to the amygdala and  
damages to the ~~prefrontal~~ <sup>hypothalamus</sup> cortex has  
caused Sylvester to be more aggressive



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Examiner Comments

This essay gained Level 4 – 8 marks.

The AO1 is accurate and thorough, given the time limit so it is Level 4. There is a description of how the prefrontal cortex, the amygdala (twice) and the hypothalamus affect aggression.

The AO2 is also Level 4. It is well developed from the AO1 points so it is logical. There is an awareness of competing arguments coming from the different parts of the brain and the application is sustained.

## Question 6 (a)

The best answers were able to gain at least 1 mark for describing the role of the unconscious with the most common answers being related to hidden desires.

Very few were able to gain the second mark. Many candidates failed to answer the question, stating what the unconscious is, rather than its role or using the term unconscious again without describing what that was.

6 (a) Describe what is meant by the 'role of the unconscious' according to Freud.

(2)

Unconscious is the later part of our consciousness  
This is where we the unknown, <sup>side of our personality</sup> ~~is~~ ~~are~~ ~~hidden~~ ~~and~~  
and memories are hidden and which is also  
unaccessible to individuals during normal daily  
life scenarios. It can be analysed through dream  
analysis where it may show up signs in our dreams  
according to Sigmund Freud.



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Examiner Comments

This response gained 1 mark for 'it is where the unknown side of our memories are hidden which are inaccessible'.

The rest of the answer is not focussed on the role of the unconscious.



## Question 6 (b)

Candidates were required to identify a strength and a weakness for the AO1 mark and then justify/exemplify this for the AO3 mark.

The better answers were able to gain the AO1 marks, but often failed to gain the AO3 marks. A lot of answers simply described a part of the theory for the strength. There were a lot of incorrect answers such as writing that it was only based on one study.

(b) Explain **one** strength and **one** weakness of Freud's psychosexual stages of development.

(4)

### Strength

it can explain why some children are very orally fixated, meaning why they are always sucking on their thumbs, pacifiers or toys, as the oral stage of Freud's psychosexual stages of development suggest that children aged 1-2 receive sexual pleasure from oral stimulation and hold on to these habits.

### Weakness

the entire theory lacks any scientific rigor, valid research or objective evidence. it is entirely based on Freud's psychoanalysis of himself and his patients, some of whom had suffered childhood sexual abuse from their parents, which he manipulated to fit his baseless theory which no evidence can vouch for other than his own interpretation.



This response gained 1 mark.

No marks for the strength as this is just description of the theory. Saying it can explain then describing oral fixation is not a strength.

1 mark for the weakness for identifying that it lacks scientific rigour, valid research or objective evidence. No marks for the exemplification as it is not entirely based on Freud and his patients. There has been plenty of other research done on it, and there is no explanation about why his own interpretation may be an issue, so this is not enough on its own.



Make sure any statements written in answers are correct.

## Question 7 (a)

The best answers were able to describe how a random sample could have been collected with reference to details from the context, with the very best being able to add a further descriptive point to gain the second mark.

A lot of answers were generic and did not add details from the context so could not gain the AO2 marks. A few answers confused random sampling with opportunity sampling.

7 Sigourney conducted an observation to see if positive reinforcement led to children reading more at home. She used a random sampling technique to collect her participants from one village. Sigourney allocated the parents and children into one of two different conditions.

- Condition A: The parents praised the children every time they sat down and read silently.
- Condition B: The parents did not praise the children when they sat down and read silently.

She recorded parents and children interacting during their reading time at home for a week. Sigourney then watched the recordings at a later date.

(a) Describe how Sigourney could use a random sampling technique for her observation.

(2)

She could randomly select the people she was going to observe so as to not give anyone any heads up, she could put all their names in a hat and pull them out at random.



This response gained 0 marks as it is not linked to the scenario.

There needs to be something more from the context. Saying she could randomly select the names would not get the mark even if it was linked as there is no description of what randomly selecting means/is.



When answering application questions include specific details from the context.

(a) Describe how Sigourney could use a random sampling technique for her observation.

(2)

Sigourney could get all the names of the children in the village and she could put it into a basket <sup>into pieces of paper</sup> and shuffle it. Then she could randomly select about 30 papers from the basket.



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Examiner Comments

This response gained 2 marks for describing how she could use a random sample as it is clearly linked to the context by referring to the children in the village.

## Question 7 (b)

The most popular strength was related to the representativeness of the sample.

The best answers were able to identify the strength in relation to the context, with a few being able to justify/exemplify the strength. There were a lot of generic answers with no reference to details from the context. A few answers gave a strength of another sampling method, often opportunity sampling.

(b) Explain **one** strength of Sigourney using a random sampling technique.

(2)

Since its ~~not~~ a random sampling she  
er has diversity when conducting a her  
study diversity in terms of gender and  
age groups of children does that affect  
the study or has a change in the  
result.



**ResultsPlus**  
Examiner Comments

This response gained 1 mark for identifying the strength that she will have diversity in the gender and age groups of the children.

There is no exemplification, so no further marks.



**ResultsPlus**  
Examiner Tip

For 'explain' questions, always include a justification/exemplification for the AO3 mark.



## Question 7 (c)

The best answers were able to identify an improvement to the sample in relation to the context and then go on to justify/exemplify why this would be an improvement.

Some answers were able to gain the AO2 identification mark, but then went on to write about a weakness of the sample rather than explain why it would improve the sample. A lot of answers were generic.

(c) Explain **one** improvement Sigourney could make to her sample.

(2)

Sigourney could have used multiple villages. For example Sigourney's sample was children ~~and~~ from one village. In order to get a more representative sample ~~the~~ Sigourney would have gone to two or more villages which would make her findings for seeing if positive reinforcement led to children reading more at home more generalisable.



This response gained 2 marks.

1 mark for identifying that she could have gone to multiple villages and 1 mark for the exemplification that this would have made her results on the effect of positive reinforcement on reading more representative so more generalisable.



When writing about an improvement for the AO3 mark, candidates should focus on explaining how the improvement would improve the study, not what a weakness of the study is.

(c) Explain **one** improvement Sigourney could make to her sample.

(2)

she could have made sure the children were of a specific ages so that they can see how each ages parent treat them.



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Examiner Comments

This response gained 0 marks as the study was not looking at how parents of different aged children treat them, so this would not be an improvement on the study that Sigourney conducted.



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Examiner Tip

When writing about an improvement to a study, candidates should not change the reasons for the study.



## Question 7 (d)

The most popular weakness was related to the subjectivity of the qualitative data, with the best answers being able to link this to details from the context.

Only the very best answers were able to gain the AO3 mark for justification/exemplification of the weakness. Again, there were a lot of generic answers with no reference to the context beyond putting in the name.

Sigourney also collected qualitative data. She wrote down what the parents said to their children when they praised them for reading. Sigourney did not collect any data from other sources.

(d) Explain **one** weakness of Sigourney using qualitative data for her observation.

(2)

The qualitative data can be inaccurate as parents may know that their children are being observed so they change their behaviour so may provide additional praise due to demand characteristics. This may affect the results of the study.



This response gained 0 marks as it is a weakness of the observation, not of using qualitative data.



Candidates should read their answer to ensure it is answering the question that is asked.

## Question 7 (e)

The best answers were able to identify an improvement to the gathering of qualitative data in relation to the context and then go on to justify/exemplify why this would be an improvement.

Some answers were able to gain the AO2 identification mark, but then went on to write about a weakness of the qualitative data rather than explain why it would improve the qualitative data.

A lot of answers were generic. Some answers changed the research method rather than focussing on how to improve the collection of qualitative data.

(e) Explain **one** improvement Sigourney could make to how she collected her qualitative data.

(2)

Instead of writing down responses she could have audio recorded the experiment to ensure ~~that~~ her notes were not incomplete to avoid ~~an~~ incorrect, incomplete data.



This gained 0 marks as it is not related to the context. Also she did video record the data as stated in the context at the start of the question.

(e) Explain **one** improvement Sigourney could make to how she collected her qualitative data.

(2)

Sigourney could've called upto 2-3 friends to take part in the observation & write down what the parents said to the children, increasing inter-rater reliability as Sigourney could compare ~~the~~ her findings with her friends.

(Total for Question 7 = 10 marks)



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Examiner Comments

This response gained 2 marks for clearly identifying an improvement in relation to the context and then clearly justifying why this would improve reliability.

## Question 8 (a)

Most candidates had a good understanding of systematic desensitisation, with the best answers being able to give four descriptive points of the process with each point being linked to the context.

Most answers were able to gain at least one mark for description of working up the hierarchy but failed to describe anything else. There were a lot of generic points within answers which limited the marks the candidates could gain.

**8** Patricia is scared of beards. Her new boss has a beard and it is affecting her ability to do her job. She has decided to try systematic desensitisation to reduce her fear of beards. Patricia goes to a local therapist.

(a) Describe how systematic desensitisation could be used with Patricia to reduce her fear of beards.

(4)

Systematic desensitisation involves the patient creating a hierarchy from the least feared item to the ~~be~~ most feared item. ~~Patricia~~ Firstly, Patricia needs to form a bond of trust between her and the therapist. Then she could create a hierarchy with the assistance of the therapist. For example, she could look at a cartoon man with a beard, then a picture of a man with a beard ~~on~~ and then finally a man with a beard. Through systemic desensitisation Patricia would start associating ~~her feelings of fear~~ ~~with~~ feelings of calmness with beards rather than feelings of fear.



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Examiner Comments

This response gained 2 marks.

1 mark for the example of the hierarchy clearly linked to the fear of beards and 1 mark for the last sentence.

The first few sentences do not gain credit as they are not linked to the context beyond stating her name.



For an application question, candidates should apply every point to the context.

## Question 8 (b)

The most popular weakness was that it failed to look at the reasons for the phobia, with the best answers being able to link this identification to details from the context and then go on to justify/exemplify their answer.

Some answers were able to gain the identification mark, but failed to gain the AO3 mark. Some answers were generic and did not refer to details from the context.

(b) Explain **one** weakness of using systematic desensitisation to treat Patricia's fear of beards.

(2)

IT MAY RAISE ETHICAL QUESTION BECAUSE IT  
CAUSES ANXIETY AND ~~OF~~ FEAR OF PARTIC PATIENT



This response gained 0 marks as it is not linked to the context.



(b) Explain **one** weakness of using systematic desensitisation to treat Patricia's fear of beards. back to  
the previous  
(2) stage.

Systematic desensitisation may only substitute her fear response with calmness using classical conditioning in the short run - in the long run, psychoanalysis may be a better technique for <sup>Patricia</sup> ~~Pat~~ to get rid of her phobia of beards as her unconscious conflicts with her father may resurface and the feeling of catharsis may get rid of her phobia and improve her relationship with her boss. (Total for Question 8 = 6 marks)



**ResultsPlus**  
Examiner Comments

This response gained 2 marks.

1 mark for identifying that psychoanalysis may be a better treatment for her phobia of beards as her unconscious conflicts may resurface and 1 mark for the exemplification that catharsis may get rid of her phobia and improve her relationship with her boss.



## Question 9

The best answers were able to gain 3 to 4 marks for a clear description of the results from the study, showing good knowledge of the study.

Some answers did not focus on the results, but also described the aims and procedure or conclusions so limiting the number of marks they could get. A few answers gave little detail and needed to be clearer on what the actual result was.

9 In your studies of learning theories and development you will have learned about the following classic study in detail:

- Watson and Rayner (1920).

Describe the results of the classic study by Watson and Rayner (1920).

After conditioning Little Albert would cry and try to crawl away when presented with the white rat, that he had previously reached forward to touch pre conditioning. Little Albert would display fear responses when presented with items that were similar to the white rat for example a white rabbit. When the context/environment in which the experiment was done was changed the fear <sup>response</sup> reaction when presented with the white rat was still the same. When Little Albert was presented with objects dissimilar from the conditioned stimulus no fear reaction was observed.



**ResultsPlus**  
Examiner Comments

This response gained 3 marks.

1 mark for the first sentence about crawling away from the white rat.

1 mark for the second sentence that he showed fear when presented with similar objects to the white rat.

1 mark for the third sentence that when they changed the environment, he still showed fear of the white rat.



For 'describe' questions, candidates should look at the number of marks available and describe that many points.

## Question 10

This essay required candidates to show knowledge and understanding (AO1) and assessment (AO3).

The best answers were able to demonstrate good knowledge and understanding of social learning theory, however a lot of answers gave the terms but offered very little knowledge and understanding of what those terms meant.

The most common study used for the assessment was one of Bandura's studies, however only the very best answers offered more assessment beyond this. A minority of answers confused social learning theory with either classical or operant conditioning.

10 Assess how far social learning theory explains human behaviour.

(8)

Social learning theory suggests that we learn through imitation.

Social learning theory suggest that if we identify with the target eg = a role model we are more likely to reproduce that behaviour by vicarious reinforcement.

Social learning theory suggests that people go through attention, retention, reproduction and motivation to imitate behaviour.

Studies such as Bandura's <sup>Bobo doll</sup> convey that children are more likely to imitate the gender they mostly identify with.

One strength of social learning theory (SLT) in <sup>explaining</sup> retention

human behaviour would be evidence from bobo doll

experiment. For example Bandura had demonstrated a

adult hitting a bobo doll with various items, children when <sup>being male / female</sup> had a chance, then imitated what the adults did when

~~that~~ in a room with the doll. This is a strength as it tends

support SLT as it shows that children are more likely to learn

through imitation, therefore increasing credibility of SLT in explaining human behaviour.

However a weakness of the social SLT in explaining human

behaviour would be that it lacks full explanation. For example

~~Bandura's~~ SLT suggests that behaviour is learnt by imitation however

we learn produce behaviour that we have never seen before.



such as children or baby sucking a dummy. This can be seen as a weakness of social learning theory as it doesn't explain how for a behaviour to be learnt when we have been exposed to it. therefore decreasing the validity of SLT, as an explanation for human behaviour.

Another strength of social learning theory (SLT) would be that there are practical application. For example SLT has helped the understanding of why children copy adults and how they learn to do a certain behaviour for example crime and stealing. This is a strength as it can help to develop intervention for children who may have been brought up in a criminal house, and help them to learn better behaviours with use of new role models. This is a strength because ~~it~~ this increases the practicality of SLT as an explanation for human behaviour.

Another weakness of SLT would be that there are other explanations for behaviour. For example <sup>classical conditioning</sup> ~~Freud~~ suggested that children learn through association and that we pair the neutral stimulus with a unconditioned stimulus and over time learn a response. This can be seen as a weakness of social learning theory as it doesn't take into account other ways in which behaviour can be learnt/acquired therefore decreasing the validity.

In conclusion social learning theory can be seen as an explanation for human behaviour due to evidence in research. ~~It~~ <sup>its</sup> credibility however does not seem to be full explanation as other theories suggest that social learning is not the only way behaviour is explained.



This response is Level 3 – 5 marks.

The AO1 is limited so Level 1, as it gives terms used with social learning theory, but does not show any knowledge or understanding of what those terms mean.

The AO3 is Level 4. There are well-developed, logical assessments with competing arguments and a balanced response. There is assessment throughout the AO3 in terms of whether social learning theory can explain human behaviour and a balanced judgement is presented.

As it is Level 4 and Level 1, the response could go into the bottom of Level 3 or the top of Level 2, so it went at the bottom of Level 3.



For knowledge and understanding, do not just name terms. Show knowledge and understanding of what those terms mean.



## Question 11

This essay required candidates to demonstrate knowledge and understanding (AO1), apply it to the context (AO2) and evaluate (AO3).

The best answers showed good knowledge and understanding of classical conditioning and were able to apply it to relevant evidence from the context throughout their answer. They were also able to develop mostly coherent chains of reasoning showing a grasp of competing arguments for their AO3 with the best applying this to the context.

Quite a few answers confused different components of classical conditioning such as what the UCS (unconditioned stimulus) and NS (neutral stimulus) were. Weaker answers often just used the terms, but failed to demonstrate knowledge and understanding of what they were and offered evaluative points that were partially developed.

11 Michelle is scared of fireworks due to the loud noise they make. She has attended several parties at her friend's house where they had fireworks. Michelle has now developed a fear of her friend's house. She has also developed a fear of going to her grandparents' house as they live in a similarly designed house to her friend.

Evaluate classical conditioning as an explanation of Michelle's fear.

Stimulus  
gen. 494  
(12)

You must make reference to the context in your answer.

Classical conditioning is learning through association or pairing of stimuli, which could generate phobias or taste aversions. The unconditioned stimulus, which is an environmental provocation that causes a reflex action or automatic response, in this case, is the loud noise made by the fireworks and the unconditioned response is Michelle's fear of the loud sound.

Further, a neutral stimulus is initially an environmental provocation that causes no response, but after association with an unconditioned stimulus, becomes the conditioned stimulus and causes a conditioned response. In this case, the neutral stimulus is Michelle's friend's house which has been paired or associated with the unconditioned stimulus of the loud noise fireworks make, leading to her conditioned response being fear of her friend's house.

Moreover, stimulus generalization has occurred, which is when a <sup>fear response</sup> is triggered when similar <sup>but</sup> not identical objects are present and the stimulus has

extended to those similar objects. In this case, Murielle developed a fear of going to her grandparents' house as it is designed similarly to her friends', and has thus associated her fear of the loud sound with her grandparents' house as well.

Stimulus discrimination is the opposite of stimulus generalisation when it is when only Murielle's friends were caused the fear, and not her grandparents' house.

Pavlov's experiment with his dogs proved classical conditioning principles as his dogs started to salivate after hearing the sound of a bell after it was paired and associated with food.

He also found that the stimulus of the bell could be generalised to other <sup>similar</sup> sounds such as tapping on a glass jar, causing his dogs to salivate.

Watson and Rayner also found that a phobia can be classically conditioned into a 9-11 month old baby by association of the fear of a loud noise to a white rat and then other similar objects such as a Santa Hat and cotton.

Systematic desensitization is a therapy based on the principles of classical conditioning used to "counter-condition" a fear response <sup>and</sup> replace it with calmness, which proves classical conditioning works as a principle. However, Donzandelyan et al.



found that classical conditioning of systematic desensitization was sufficient on its own, and only when combined with assertive training, a phobia can be alleviated.

In conclusion, it can be said that classical conditioning could have caused Michelle's phobia as there is evidence to show she has associated her fear with similar horses to her friends. However, the approach is reductionist and does not take into account biological factors that may account for her <sup>maladjusted</sup> fear, such as a poor functioning amygdala and ~~also~~ has also been proven sufficient on its own according to Toon zandbergen et al.



**ResultsPlus**  
Examiner Comments

This response gained Level 3 – 9 marks.

The AO1 is Level 4 as it is accurate and thorough.

The AO2 is Level 3. Lines of argument are supported by relevant evidence from the context and this is integrated into the AO1, but is not sustained throughout the essay.

AO3 is Level 3. The arguments are developed and there is a grasp of competing arguments at the end of the essay.

## Question 12

Candidates were required to show knowledge and understanding of the two studies (AO1) and evaluate them in terms of ethics and reliability (AO3).

Candidates often showed a better understanding of Brendgen's study. The best answers focussed on the correct two studies and showed good knowledge and understanding and focussed their evaluation on ethics and reliability giving developed arguments.

However, in a lot of answers the evaluation points were partially developed. A large minority of candidates showed knowledge and understanding of the incorrect Skinner study so limiting their AO1 marks. Some answers did not focus on ethics and reliability and gave general evaluations of the studies limiting their AO3 marks. There are still some candidates who apply human ethics to animal studies.

12 In your studies of biological psychology and learning theories and development you will have learned about the following studies in detail:

- Brendgen et al. (2005)
- Skinner (1948) Superstition in the pigeon.

Evaluate Brendgen et al. (2005) and Skinner (1948) in terms of ethical considerations and reliability.

A01 - 8  
A02 - 8

Brendgen - 3 ethical  
2 reliable (16)

Brendgen et al used twin pairs as his study sample. When the twins were 6 years old, the data was gathered from them about the social adaptation to kindergarten. Before any of these data is gathered, written informed consent were ~~obtained from~~ <sup>given to</sup> their parents. Therefore the study was given informed consent which is an ethical consideration in BPS. So the study is ethical.

Also Brendgen et al has given the ~~right~~ to withdrawal at any point in the study for the children and for the teacher's who had to rate the students physical and social aggression. So the study has given right to withdrawal to the participants which is also in the BPS. Therefore the study is ethical.

Brendgen et al has used standardised procedures such as a questionnaire and scales such as direct and indirect aggression



scaled to gather information about physical and social aggression from the teachers about the twins in their class. So the study has been high in reliability so can be replicated to see for consistent results.

Bremdon et al also used both children and the teacher's in the twins class to gather information to see whether they have consistent results. This increases the inter-rater reliability.

Skinner which tested on superposition in the pigeon, used pigeons as his sample. In this study he used 8 hungry pigeons. ~~for~~ we don't know for ~~how~~<sup>which</sup> extent do these pigeons are suffering from hunger. ~~so~~ It is unethical to cause harm to the sample according to the BPS. Therefore Skinner has ethical issues with harming the sample of the study.

Also, by using animals in the experiment ~~the~~ Skinner can't give informed consent or a right to withdrawal. ~~to~~ This is because animals have different physiology and anatomy from humans and they can't invoke reasons or think about their experiences. Therefore the study lacks ethical considerations.

Skinner used 2 observers to observe the study and the behaviour of the pigeons. Therefore the study is high in reliability because we can compare the results gathered by the two observers to check whether they have consistent results. ~~So the study~~

In this experiment Skinner used a Skinner box which is empty except for the plate that was there to place the food for the pigeons when reinforcing. The Skinner boxes were all the same size. Therefore, Skinner has used standardised procedures as mentioned above. Therefore the study can be easily replicated and so the study is high in reliability.

In conclusion, Brengdon et al had no ethical issues as not giving informed consent or not providing the right to withdraw whereas Skinner's experiment had many ethical issues. Considering about reliability both studies were high in reliability such as due to reasons such as using standardised procedures and high in inter-rater reliability.



This response gained Level 3 – 10 marks.

The AO1 is mostly accurate, but there is an inaccuracy in the knowledge and understanding of Skinner’s study so it is Level 2.

The AO3 is Level 3, though some of it should be ignored as it is about generalisability not ethical considerations or reliability. The points that are relevant are at Level 3.



Candidates should focus on the ethical considerations of using animals if the question asks about the ethics of using animals.

## Paper Summary

**Based on their performance on this paper candidates are offered the following advice:**

- Candidates would benefit from reviewing the taxonomy of terms so that they can understand what is required for different types of questions, such as what is required for 'explain' questions.
- Candidates would benefit from practising 'application' questions to ensure they clearly link to details from the scenario to show understanding of the context. Giving the name is not enough to apply their answer to the context.
- When justifying or exemplifying strengths or weaknesses, candidates should make sure they do not just use a term from GRAVE (generalisability, reliability, application, validity and ethics) but explain that term in relation to their given strength or weakness.
- When writing responses to extended open-response questions, candidates should demonstrate their knowledge and understanding for the AO1 marks rather than just write terms with no knowledge and understanding demonstrated of what those terms are.

## **Grade boundaries**

Grade boundaries for this, and all other papers, can be found on the website on this link:

<https://qualifications.pearson.com/en/support/support-topics/results-certification/grade-boundaries.html>

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