

## **Teacher Resource Bank**

GCE Psychology B Candidate Exemplar Work: PSYB1



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## CANDIDATE EXEMPLAR WORK

## **PSYB1 – Poor Answer**

1 (a) What do social learning theorists mean by the term *modelling*? Give an example of how modelling might be used by someone going to an exercise class for the first time. (2 marks)

Modelling is where a person takes one thing about a person and copies it, in an exercise class for example they would copy posture or movements of someone else.

**Examiner's comments** The candidate does not clearly portray an understanding of what is meant by the term modelling. However, the answer shows some understanding of the term in relation to an exercise class. This answer scores 1 mark.

- 1 (b) Psychologists use many methods to identify areas of cortical specialisation in the brain.
  - (i) Explain one methodological problem which might arise when using neurosurgery to identify areas of cortical specialisation in the brain.

(2 marks)

One methodological problem might be that it is very difficult for psychologists to accurately tell what area of the brain is responsible for a certain function.

**Examiner's comments** The candidate correctly identifies a methodological problem which might arise when using neurosurgery, but fails to expand upon why this is a problem. This answer scores 1 mark.

(ii) Explain one ethical issue that might arise when using PET scans to identify areas of cortical specialisation in the brain. (2 marks)

One ethical issue that might arise when using PET scans is that a person is being injected with a radioactive substance. This might not be what the person wants to happen.

**Examiner's comments** The candidate identifies the ethical issue being the injection of a radioactive substance but does not explain why this is an ethical issue. The reason given is unlikely. This answer scores 1 mark.

 (c) Niamh is eight years old and suffers from a medical condition which means she often has to go into hospital. Each time she goes into hospital, the treatment makes her feel sick. One day, Niamh's mother took her to visit her grandmother in hospital. When they arrived at the hospital, Niamh complained to her mother that she felt sick.

Referring to features of the behaviourist approach in psychology, explain why Niamh felt sick when she went to visit her grandmother in hospital.

(4 marks)

Niamh has learnt from conditioning that visiting a hospital often makes her feel ill. Through classical conditioning, a behaviourist assumption, Niamh has associated coming to the hospital (an unconditioned stimulus) with being ill (a conditioned response) the behaviourist approach outlines that an unconditioned stimuli paired with a conditioned stimuli triggers a response. Even though Niamh is not visiting the hospital for herself her association with previous experience triggers a response from her brain letting her know that the experience will be unpleasant. This is to alert us from danger in the future.

**Examiner's comments** The candidate has correctly understood that the stem refers to classical conditioning. However, there is some confusion with the incorrect portrayal of the hospital as unconditioned stimulus. That said, the candidate does go on to accurately state the pairing of an unconditioned stimulus with a conditioned stimulus in order to bring about some form of response. The answer scores 3 marks.

- 1 (d) Describe and evaluate the following methods used by psychologists to investigate the genetic basis of behaviour.
  - twin studies
    - adoption studies (10 marks)

Psychologists can use twins to study the genetic basis of behaviour. Twins are used because psychologists can compare identical twins, who share the same DNA, and see if they share a behaviour e.g., schizophrenia. Gottesman and Shields found that MZ twins were more genetically alike for schizophrenia than DZ twins.

Another method is adoption studies. Children who are adopted are compared to their biological parents to see if they both share a behaviour. If they do then this means the behaviour is genetic. If they don't, then this behaviour is because of the way in which they were brought up - it has nothing to do with their genes.

**Examiner's comments** The candidate provides a somewhat brief, yet accurate answer. Firstly, the candidate demonstrates understanding that identical twins share the same genetic make-up. Reference to appropriate evidence is made. However, the candidate fails to provide some detail of the study for AO1 marks. The findings of the study are correctly presented but no conclusion and/or implication of the study is discussed. The candidate also shows an understanding of the method involved and rationale underlying the use of adoption studies. However, no evidence is presented in support and/or criticism of the method. There is no reference to evaluation. This answer scores 5 marks (AO1 = 4, AO2 = 1).

The awarding of 5 marks is justified by the mark bands:

4 – 7 marks **Average answers** The answer shows reasonably accurate and organised description of method(s) though it may lack detail. The valuation of each method(s) may lack some clarity, coherence or detail. There may be some irrelevance, inaccuracy or a lack of focus. An otherwise good answer referring to only one method may gain a maximum of six marks.

The awarding of 5 marks is justified by the quality of written communication within this band:

4 – 7 marks **Average answers** The answer has some structure with some appropriate use of paragraphs and sentences. There are some errors of spelling and punctuation.

## PSYB1 – Good Answer

1 (a) What do social learning theorists mean by the term *modelling*? Give an example of how modelling might be used by someone going to an exercise class for the first time. (2 marks)

Modelling is a term used to describe someone observing another person's behaviour that is desirable to the individual, this may then be imitated. An example for an exercise would be watching the instructor and then copying their movements.

**Examiner's comments** The candidate has clearly defined what is meant by the term modelling. There is appropriate reference to an example of modelling in relation to an exercise class. This answer scores 2 marks.

- 1 (b) Psychologists use many methods to identify areas of cortical specialisation in the brain.
  - (i) Explain one methodological problem which might arise when using neurosurgery to identify areas of cortical specialisation in the brain.

(2 marks)

One methodological problem might be that it is difficult to say which part of the brain is responsible for a certain function. This is because taking away one part of a person's brain might only show how the rest of the brain functions, it does not clearly show the part, or function, that was taken away.

**Examiner's comments** The candidate has correctly identified an appropriate methodological problem which might arise when using neurosurgery. There is a relevant and clear explanation of why this is a problem for full marks. This answer scores 2 marks.

(ii) Explain one ethical issue that might arise when using PET scans to identify areas of cortical specialisation in the brain. (2 marks)

One ethical issue might be that the person is being injected with radioactive glucose. The person needs to be made fully aware of the procedure and give their consent.

**Examiner's comments** The candidate has correctly identified an appropriate ethical issue that might arise when using PET scans. There is insightful reference to informed consent. This answer scores 2 marks.

 (c) Niamh is eight years old and suffers from a medical condition which means she often has to go into hospital. Each time she goes into hospital, the treatment makes her feel sick. One day, Niamh's mother took her to visit her grandmother in hospital. When they arrived at the hospital, Niamh complained to her mother that she felt sick.

Referring to features of the behaviourist approach in psychology, explain why Niamh felt sick when she went to visit her grandmother in hospital. *(4 marks)* 

One feature of the behaviourist approach is classical conditioning where a stimulus is associated with a response. With Niamh, her unconditioned stimulus is having treatment. Her unconditioned response is her feeling sick due to the treatment. There is also a conditioned stimulus with Niamh having to go to hospital to have treatment. As Niamh feels sick when she has treatment because she is at the hospital she associates feeling sick with being at the hospital. Therefore when she goes to the hospital to visit her grandmother, she feels sick as a conditioned response as even though she is not having treatment she is still at the hospital.

**Examiner's comments** The candidate has correctly understood that the stem refers to classical conditioning. However, there is some confusion with the incorrect portrayal of the hospital as unconditioned stimulus. That said, the candidate does go on to accurately state the pairing of an unconditioned stimulus with a conditioned stimulus in order to bring about some form of response. The answer scores 3 marks.

1 (d) Describe and evaluate the following methods used by psychologists to investigate the genetic basis of behaviour.

- twin studies
- adoption studies

(10 marks)

One method used by psychologists to investigate the genetic basis of behaviour is twin studies. Psychologists compare identical (MZ) twins and/or dizygotic (DZ) twins. If one twin has, for example, a high IQ and so does the other twin, then the psychologist would argue that intelligence has a genetic basis. For example, Bouchard and McGue (1981) found that identical twins had a correlation of .85 for intelligence compared to non-identical twins which was .58. This shows evidence for a genetic basis of intelligence. However, some psychologists would criticise these results because the concordance rate is not 100%. Therefore, it may be argued that the environment (nurture) has some influence on a person's intelligence. Another method psychologists use to investigate the genetic basis of behaviour is adoption studies. This is where psychologists compare characteristics of the adopted child with their biological parents and/or adopted parents. If an adopted child shows characteristics that are also shown in their biological parents but not their adopted parents, then a genetic basis for that behaviour may be assumed. For example, Horn (1983) in the Texas Adoption Study, found that adopted children had a higher correlation with their biological mother compared to their adopted mother. This therefore supports a genetic basis of behaviour. If the adopted children showed a higher correlation with their adoptive parents compared to their biological parents, then psychologists would argue nurture - that it is the environment in which we are raised that shapes the characteristics that we show.

**Examiner's comments** The candidate begins his/her response with correct knowledge and understanding of the rationale underlying the use of twin studies to investigate the genetic basis of behaviour. Appropriate reference is made to Bouchard and McGue (1981) with insightful evaluation. However, the candidate misses an opportunity to gain further AO1 credit for providing some detail about the study itself.

Again, as for twin studies, the candidate understands the rationale for conducting adoption studies. There is appropriate reference to Horn (1983) Texas Adoption Study. Like for twin studies, the candidate could have received AO1 credit if a little more detail about the study was portrayed. There is evidence of evaluation. This answer scores 8 marks (AO1 = 3, AO2 = 5).

The awarding of 8 marks is justified by the mark bands:

8 – 10 marks **Good answers** The answer shows accurate, well organised and detailed description of the two methods used by psychologists to investigate the genetic basis of behaviour. The evaluation of each method is presented with clarity, coherence and detail. There is appropriate reference to relevant evidence. The answer is well focused with little or no misunderstanding.

The awarding of 8 marks is justified by the quality of written communication within this band:

8 – 10 marks **Good answers** The answer is well-structured with effective use of paragraphs and sentences. There are very few errors of spelling and punctuation.