

## **Designing Your Own Investigation – Controlled Observation**

Question: Explain how you would carry out an observation to investigate television preferences of pets.

## You must refer to:

- a controlled or naturalistic observation
- behaviour categories or coding frames
- how you would reduce observer effects

You should use your own experience of carrying out an observation to inform your response. Justify your decisions as part of your explanation. (12 marks)

## **Student Response**

I will carry out a controlled observation in a laboratory at a University. This is a highly controlled environment in which I am able to manipulate the conditions, which will be pets watching different TV programmes and observing their behaviour in an environment with no distractions. If this were to be a naturalistic observation in the animals' own homes, then although it would be more realistic there would be other variables than may affect their behaviour such as their owners, treats, other pets. With a controlled observation I can be confident that pets' behaviour is being caused by the TV programme and therefore they like certain programmes more than others.

I was able to make similar causal conclusions in my own controlled observation. Participants were given no instructions, but either watched a video of pool trick shots or were shown no video at all. They were then given 5 minutes to play pool; during the observation we found that they were more likely to perform the trick shots from the video if they had watched it, compared to the control group. So we concluded that environmental factors influenced behaviour, as everything else was controlled.

In this study I will use a coding frame when observing pets' behaviour. I will use a coding frame because this will allow me to observe pre-determined behaviours which will prevent anything being missed and tallies of these behaviours can also be analysed easily as it will be quantitative data. A further benefit of my coding frame is that as well as measuring how often a behaviour occurs I can also measure the strength/severity of a behaviour.

In my own observation into aggression I used a coding frame to record the behaviour of various aggressive acts. For example a weak kick was coded as K1, a moderate kick was K5 and a very aggressive kick was K10. Similarly, P1-P10 was used for different strengths of punches, while other codes include Sh for shouting and Sw for swearing with associated numbers. Using this code made it very easy for me to record behaviours. What I learned from my own observation can be applied here.

Twenty dogs will be shown three different TV programmes for 5 minutes. The programmes will be *Eastenders, Made in Chelsea* and *Big Bang Theory*. The coding frame will include some of the following behaviours: JU – Jumps up, Dr – Dribbles, SI –



Sleeps, TA – Turns Away, CS – Close to the Screen, LTV – Licks TV, B – Barks, and Wh – Whines. Numbers can be added to these codes where necessary; for example, if it is a constant loud bark, then B10 will be given. Comparisons can then be made between the different dogs and the different TV programmes to judge which show is preferred. For example there may be most TAs for *Made in Chelsea* and most LTVs for *Big Bang Theory*, suggesting the *Big Bang Theory* is the most preferred programme for dogs and *Made in Chelsea* is the least preferred.

Although dogs will obviously not show observer effects in terms of changing their behaviour because they know they are being observed and demonstrating demand characteristics, the mere presence of an unfamiliar person may excite, anger or distress the dog, therefore changing the focus from the TV programme to the observer. In the observation practical that I conducted we observed children through a one-way mirror; that way they were not affected by our presence and therefore behaved more naturally. In this piece of research we will observe dogs through a one way mirror, so they are not influenced by us being around and therefore results will not be affected by confounding variables.





## **Student Response with Examiner Commentary**

When marking this question, examiners are looking for four key requirements to have been met within the answer:

- 1. Addressing all of the required features (the 3/4 bullet points)
- 2. Justifying your design decisions
- 3. Contextualising your answer applying your knowledge to the scenario
- 4. Explicitly linking your design decisions to your own practical work

In the answer below, coloured text indicates where credit for the four requirements are given. Where content is not coloured, that part of the answer is not meeting the requirements of the question.

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The first required feature – controlled observation is addressed. This is then contextualised to this scenario.

Justification is provided as to why a controlled observation is preferable to a naturalistic observation and further context is provided to support the justification.

This paragraph makes reference to own practical work and explains what was concluded from it that can then be applied to this study.

In this paragraph the second required feature is addressed and its use is justified.



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Another good paragraph which explicitly links own experience to the required features of this investigation. This demonstrates that the response is being informed by own practical work.

Knowledge and understanding of coding frames and own experience of them is applied effectively to this investigation. There is clear evidence of strong application of knowledge.

Reference to the final required feature is made.

Application of the feature is made to this scenario.

Links are made between own research and planned research through the use of a one-way mirror.

Brief justification is made.

Examiner style comments: Mark band level 4: 10-12 marks.

Although there may be a number of responses that are better than this answer, it meets the requirements of the mark scheme to be awarded a top band mark. All the required features are addressed in some detail and knowledge and understanding of them is clear. There is appropriate justification of all decisions and some are contextualised. Finally, there are definite explicit links between the planned research and previous practical work.