

Holism and Reductionism - Mark Scheme

Q1.

[AO3 = 4]

In **each case** award marks as follows:

2 marks for a clear and coherent strength / limitation with some elaboration.

1 mark for a limited / muddled strength / limitation.

Possible strengths:

- studying basic units of behaviour underpins the scientific approach / adds weight to scientific research
- more objective to consider basic components of behaviour
- leads to greater clarity of understanding, e.g. at the chemical, cellular level
- better able to isolate cause when studying basic units of behaviour, e.g. can see which chemicals are implicated in certain behavioural disorders, then may be able to effect treatment
- parsimonious – the simplest explanation is often the best.

Possible imitations:

- simplistic and ignores the complex interaction of many factors
- leads to us losing sight of behaviour in context
- less able to understand the behaviour because we do not understand its meaning - loss of validity
- ignores emergent properties / distracts from a more appropriate level of explanation.

Credit other relevant strengths and limitations.

[4]

Q2.

[AO1 = 2]

2 marks for clear and coherent outline which explains how explanations vary from those at a lower or fundamental level focusing on basic components or units to those at a higher more holistic multivariable level.

1 mark for vague or incomplete outline which refers to explanations at fundamental / basic and more holistic levels.

0 marks for mere reference to there being different levels of explanation.

Credit answers where knowledge of term is embedded in an example.

Q3.

(a) [AO2 = 4]

Level	Marks	Description
2	3 – 4	Knowledge of both holism and reductionism is clear and mostly accurate. Application to the scenario is mostly appropriate. The answer is generally coherent with effective use of psychological terminology.
1	1 – 2	Some knowledge of holism and/or reductionism is evident. Application to the scenario is not always effective or not presented in psychological terms. The answer lacks accuracy and detail. OR Either holism or reductionism explained and applied at Level 2.
	0	No relevant content.

Application:

- Holism – focus on the whole system or person
- Reductionism – focus on constituent elements or smaller, simpler aspects
- Dr Grant takes a reductionist approach focusing just on biological mechanism
- Dr Austin takes a more holistic approach focusing on broader experiences and circumstances

Credit other relevant material.

(b) [AO3 = 1]

1 mark for a brief valid suggestion

Possible suggestions:

- Keep information confidential
- Show respect for the patient eg listening, appreciating the patient's perspective
- Ensure the patient is not harmed – does not feel worse after the interview than before

Credit other relevant suggestions.

Q4.(a) **[AO2 = 2]****1 mark** for **each** of the following points:

- excitement is a broad construct / complex behaviour / has many aspects
- heart rate is a narrow, biological / physical component / unit / element / factor in overall excitement.

2

(b) **[AO3 = 4]**For **each** outline award marks as follows:**2 marks** for a clear and coherent outline with some elaboration.**1 mark** for a limited / muddled outline.**Possible content:**

- questionnaire measuring attitude – questions assess how the participant feels about going on the roller coaster
- rating scale of own excitement – the participant could rate their perceived level of excitement on a scale of 1 – 10
- observation of non-verbal behaviour whilst waiting in the queue; e.g. tallying appropriate behavioural categories
- interviews before / after the participant has been on the ride asking questions about how they felt / whether they enjoy other exciting occasions / events / how they cope with excitement, etc.

Do not credit measures of biological function.

Just naming a method e.g. questionnaire / interview / observation is not sufficient.

4

[6]**Q5.****Marks for this question: AO1 = 6, AO3 = 10**

Level	Marks	Description
4	13 – 16	Knowledge is accurate and generally well detailed. Discussion / evaluation / application is thorough and effective. Effective use of at least one topic. The answer is clear, coherent and focused. Specialist terminology is used effectively. Minor detail and / or expansion of argument sometimes lacking.
3	9 – 12	Knowledge is evident. There are occasional inaccuracies. Discussion / evaluation / application is apparent and mostly effective. Some use of at least one topic. The answer is mostly clear and organised. Specialist terminology is mostly used effectively. Lacks focus in places.

2	5 – 8	Some knowledge is present. Focus is mainly on description. Any discussion / evaluation / application is only partly effective. The answer lacks clarity, accuracy and organisation in places. Specialist terminology is used inappropriately on occasions.
1	1 – 4	Knowledge is limited. Discussion / evaluation / application is limited, poorly focused or absent. The answer as a whole lacks clarity, has many inaccuracies and is poorly organised. Specialist terminology either absent or inappropriately used.
	0	No relevant content.

Please note that although the content for this mark scheme remains the same, on most mark schemes for the new AQA Specification (Sept 2015 onwards) content appears as a bulleted list.

AO1

Marks for demonstrating knowledge and understanding relevant to the holism-reductionism debate. Likely content: the types of reductionism such as structuralism, biological, behaviourist / environmental / S-R; psychic-reductionism; levels of explanation; humanistic psychology and emphasis on the whole person / whole of experience; Gestalt psychology; interactionism.

Minimal credit for simply defining the debate: whether or not behaviour should be explained or studied as a whole or its component parts.

AO3

Marks for discussion, analysis and application of the debate to topics. Likely discussion points might stem from an evaluation of reductionism and comparisons with holism and interactionism, and include: advantages of parsimony; scientific and analytic approach; ease of testing; scientific support and credibility; control and prediction, implications for treatment.

Limitations may include oversimplification; value and reduced validity of explanation. References to topics might cover theories of learning eg conditioning vs. insight learning; gender; perception; face recognition; schizophrenia; substance abuse; forensic psychology.

Credit references to approaches and to other philosophical debates.

Credit use of relevant evidence.