**UNIVERSITY OF CAMBRIDGE INTERNATIONAL EXAMINATIONS**

**GCE Advanced Subsidiary Level and GCE Advanced Level**

# MARK SCHEME for the May/June 2012 question paper

# for the guidance of teachers

## 9698 PSYCHOLOGY

**9698/12** Paper 1 (Core Studies 1), maximum raw mark 80

This mark scheme is published as an aid to teachers and candidates, to indicate the requirements of the examination. It shows the basis on which Examiners were instructed to award marks. It does not indicate the details of the discussions that took place at an Examiners' meeting before marking began, which would have considered the acceptability of alternative answers.

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## Section A

**1 From the study by Mann et al (lying):**

**(a) Describe <u>one</u> individual difference in deceptive behaviour. [2]**

*Any behaviour recorded* could *be used but most likely:*
head movements – 50% increased when lying, 50% decreased when lying
speech disturbances – 50% increased when lying, 50% decreased when lying
gaze aversion – 56% increased when lying, 44% decreased when lying

*possibly:*
blinking – 81% decreased when lying
pauses – 81% increased when lying

Could also quote results from other studies reported by MVB:
hand/arm movements – 69% decreased when lying, 31% increased when lying

1 mark partial (e.g. relative: more/less), 2 marks full (e.g. with numbers)

NB: No marks for just saying 'there is a difference between…"

**(b) Explain why Mann et al challenged the simplistic view that typical deceptive behaviour exists. [2]**

"Importantly, the findings of this study demonstrated <u>large individual differences</u> <u>in deceptive behaviour</u> and they <u>challenge</u> the simplistic view, even expressed by professional lie-catchers… that a <u>typical deceptive behaviour exists</u>."

1 mark partial (1 idea), 2 marks full (elaboration e.g. both ideas: large individual differences & challenges view of 'typical deceptive behaviour')

NB: No marks for "…that a <u>typical deceptive behaviour exists" in isolation, as just copied from the stem</u>

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**2 From the study by Loftus and Pickrell (false memories):**

**(a) Explain what the participants believed the study was about. [2]**

"Subjects were told that they were participating in a study on childhood memories, and that we were interested in how and why people remembered some things and not others." (full)
"The subjects in this study thought they were participating in a study of 'the kinds of things you may be able to remember from your childhood." (partial)
childhood memories (partial)

Participants may also have had beliefs based on:
- being "…given a brief description of four events that supposedly occurred while the subject and close family members were together."
- the booklets they had to fill in

1 mark partial (any 1 of the five ideas), 2 marks full (any 2 ideas).

NB: believed study was about 'memory' (without further elaboration) = 0

**(b) Explain why this was necessary. [2]**

If they had known the real purpose it would not have been possible to investigate false beliefs as they would have known which event was false.

1 mark partial, 2 marks full

1 mark only for simple comment about demand characteristics / validity / avoiding confounding variables without further explanation.

**3 Baron-Cohen et al (eyes test) used four groups of participants. Describe two of these groups. [4]**

Any two from:
1. *AS and HFA (or 'experimental' group):* 15 male adults with Asperger's Syndrome or High Functioning Autistics. IQ = 115 av. i.e. normal
   NB: accept AS or HFA or both
2. *Normal adults*: 122 people from adult community and education classes in Exeter or Cambridge public library (mix of occupations: unemployed, manual, professional, and education: secondary school only, additional occupational or degree). IQ = 115 av. i.e. normal
3. Normal adult students: 103 Cambridge undergraduates, 53 male / 50 female, 71 science / 32 other subjects, assumed to have high IQ.
4. Random adults from population: 14, IQ matched with group 1, similar in age to group 1. IQ = 116 av. i.e. normal

1 mark partial, **2** marks full **× 2**

Partial = 'name' of group only or one distinguishing feature.
Full = identification of group plus at least one additional detail (e.g. number, genders, source)

NB: details of sample p243

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**4 From the study by Milgram (obedience):**

**(a) Describe how the experimenter tried to stop participants from withdrawing from the study. [2]**

Use of verbal prods (partial)
This put pressure on the participants to continue and contradicted the initial information about / example of prods.

1 mark partial, 2 marks full

NB: "payment" = 0

**(b) Why are participants given the right to withdraw from psychology studies? [2]**

Unethical to detain participants against their wishes (full)

they may suffer harm if they stay (full)

1 mark partial, 2 marks full

NB: "against human rights" / "bad ethics" alone = 0

**5 In the prison simulation by Haney, Banks and Zimbardo, the prisoners were given a distinctive uniform.**

**(a) Identify two features of the prisoners' uniform. [2]**

loose smock, ankle chain/lock, no underwear, hair 'net', rubber sandles, ID number (front & back).

1 mark per feature × 2

**(b) What effect did the uniform have on the prisoners' behaviour? [2]**

depersonalised, emasculated (i.e. dependency on guards), deindividuated

1 mark partial (e.g. named/identified), 2 marks full
Elaboration for full marks may be explanation, example or 2 named.

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**6 From the study by Piliavin et al (subway Samaritans):**

**(a) Describe <u>two</u> behaviours of the 'drunk' victim. [2]**

(Smelled of liquor) / carried a brown paper bag.
Stood next to pole in critical area.
When passing first station, staggered forward and collapsed (credit ambiguous references to stagger forward / collapse but <u>not</u> if clearly just a reference to drunken behaviour).

1 mark partial, 2 marks full

**(b) Describe <u>one</u> way in which the results of the 'drunk' condition differed from those of the 'ill' condition. [2]**

Drunk helped spontaneously on 19/38 trials, ill helped on 62/65 trials. Therefore less helping of drunk. Also drunk was more likely to be helped by member of same race ('black' or 'white').
"less help" = partial

1 mark partial, 2 marks full

Must be elaboration for full marks (not second 'way') e.g. using numerical results.
Elaboration may be in terms of "drunkenness is own fault".

**7 Using the study by Tajfel on intergroup categorisation:**

**(a) Outline <u>one</u> key feature of ethnocentrism. [2]**

Negative attitudes and behaviour toward the outgroup AND positive attitudes and behaviour towards the ingroup, i.e. ingroup favouritism and outgroup discrimination.
More generally being unable to conceptualise the world from any other viewpoint than one's own culture or social group.
The belief that this group is superior to all others. (full)

1 mark partial, 2 marks full

**(b) According to Tajfel, what are the minimum conditions for creating ethnocentrism? [2]**

Categorisation of people into two or more groups (on the basis of anything).

1 mark partial, 2 marks full

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**8 In the study by Freud, little Hans is referred to as 'a little Oedipus'.**

**(a) Briefly outline the Oedipus complex. [2]**

Unconscious sexual feelings towards mother and wanting father removed.

1 mark partial, 2 marks full

**(b) Describe <u>one</u> piece of evidence from the study which suggests that Hans is 'a little Oedipus'. [2]**

*Most likely:*
phobia of horses, fascination with widdler, giraffe episode.

1 mark partial (identification of evidence), 2 marks full (some detail)

**9 Langlois et al (infant facial preference) suggested three reasons why study 1 was done. Explain <u>two</u> of these reasons. [4]**

"Our purposes in conducting this study were,
- first, to replicate our previous results with adult female facial stimuli
- second, to extend the results to male facial stimuli
- and third, to investigate whether the manner in which male and female faces are presented influences infant preferences."

2 reasons = 2 marks × 2

*2nd mark for detailed description/elaboration e.g.:*
replication: to check reliability
males/presentation: because Shapiro et al noted that infants' interest in male faces reduced when presented with females
replication: of first findings with females/that infants prefer attractive faces (full)

NB: race and babies' faces are Study 2, so = 0

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**10 From the study by Nelson (children's morals):**

**(a) Describe the pictures in the motive-<u>implicit</u> condition. [2]**

Black and white; line drawings; 25 cm × 23 cm; illustrating motive, behaviour and outcome, by facial expression alone. Description of story.

1 mark partial, 2 marks full

**(b) Explain what was different about the pictures in the motive-<u>explicit</u> condition. [2]**

Positive and negative emotions obviously/clearly conveyed, by connecting to the actor's head cartoon-like representations of the goal he intends to achieve.

Accept illustration for 1 mark.

1 mark partial, 2 marks full

NB: description of the story here = 0

**11 From the study by Schachter and Singer (emotion):**

**(a) Identify the <u>two</u> factors from the two-factor theory of emotion. [2]**

Arousal/physiological component and cognitive/psychological component

1 factor = 1 mark × 2

**(b) How was each factor manipulated in the study? [2]**

Arousal: manipulated by injection
cognition/emotion: manipulated by angry / euphoric situation, informed / misinformed.

2 explanations of manipulation for 2 marks.

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**12 The study by Dement and Kleitman (sleep and dreaming) used a self report method.**

**(a) Outline how the self report method was used in this study. [2]**

Woke participants and asked them to recall various aspects (spoken into a recording device near the bed), use of door bell, guess if 5 or 15 minutes

NB marks are for *how,* not what was asked (although this could be elaboration) and not what was found.

1 mark partial, 2 marks full

**(b) Describe <u>one</u> problem with self report data in this study. [2]**

*Most likely:*
not accurate, subjective. Ps may respond to demand characteristics / may give socially desirable responses; may just make up a dream!

e.g.:
The Ps could have just lied (1 mark)
The Ps could have lied about their dream (2 marks)

1 mark partial (disadvantage identified), 2 marks full (disadvantage related to study, however briefly).

**13 From the study by Maguire et al (taxi drivers):**

**(a) Describe <u>one</u> way in which experienced taxi drivers are unusual in their way-finding. [2]**

<u>Extensive</u> (topographical) knowledge of area (London) (acquired through 3 years' training / passing exams). <u>Better</u> knowledge of short cuts. Knowledge of <u>minor</u> streets, use a bigger right (posterior) hippocampus

e.g.:
They know London <u>better</u> (1 mark)
They would know <u>more</u> streets and their names (2 marks)

1 mark partial (way in which they differ), 2 marks full (some detail)

**(b) Describe <u>one</u> way in which experienced taxi drivers are similar to other people in their way-finding. [2]**

*Most likely:*
The cognitive strategies they use in way-finding
e.g. using landmarks and routes.
use their right hippocampus

1 mark partial, 2 marks full

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**14 What were the <u>four</u> odours used in the study by Demattè et al (smells and facial attractiveness)? [4]**

- geranium (flower)
- male fragrance (Gravity/male perfume/scent/aftershave)
- rubber (latex)
- body odor (BO)

1 mark per odour × 4.

**15 From the results of long mirror checking sessions in the study by Veale and Riley:**

**(a) Give <u>two</u> uses of the mirror by body dysmorphic disorder (BDD) patients. [2]**

From the text:
- to **compare** what they see in front of a mirror **with an image in their mind** of how they think they **should ideally look**
- try to **see something different** in the mirror

Also allow:
- picking spots
- feeling skin
- combing/styling hair

2 uses for 2 marks.

**(b) Give <u>two</u> uses of the mirror that were more common in the control participants than the BDD patients. [2]**

- removing hairs
- shaving

2 uses for 2 marks.

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## Section B

**16 Evaluate <u>one</u> of the studies listed below in terms of its contribution to the nature-nurture debate.**

**Held and Hein (kitten carousel)**
**Bandura et al (aggression)**
**Nelson (children's morals)** **[10]**

No marks for description of study.

No answer or incorrect answer [0]

Anecdotal evaluation, brief detail, minimal focus. Very limited range. Evaluation may be inaccurate, incomplete or muddled. [1–3]

*Either* points illustrating the debate lack depth and/or breadth *or* only nature or nurture is considered. The answer is general rather than focused on study but shows some understanding. [4–5]

Both sides of the debate are considered and argument is focused on the study although the evaluation may be imbalanced in terms of quality and/or depth. The answer shows reasonable understanding. [6–7]

Balance of detail between nature and nurture and both are focused on the study. Evaluation is detailed with good understanding and clear expression. [8–10]

Examples of possible evaluation points:

**Held and Hein**
- shows visually guided movement (paw placement) is determined by nurture
- ditto depth perception
- some perceptual skills are pure nature, e.g. visual pursuit, change in pupil size, paw placing (on horizontal surface)
- but kittens are mobile much earlier than humans – are the findings generalisible?

**Bandura, Ross and Ross**
- children imitated the aggression they observed – nurture
- children imitated same sex model more – could be influenced by nature or nurture
- boys imitated more physical (and girls somewhat more verbal) aggression – could be influenced by nature or nurture

**Nelson**
- Piaget thought that cognitive (and therefore moral) development was maturation-driven (i.e. nature)
- results show children have moral understanding much earlier
- but that this does develop, as 7 year-olds used both motive and outcome information more than 3 year-olds
- preschoolers put more emphasis on negative valence of cue, supporting idea that in terms of nurture, children develop concept of 'bad' before 'good'

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**17 Discuss the strengths and weaknesses of the psychology of individual differences using <u>one</u> of the studies listed below as an example.**

**Rosenhan (sane in insane places)**
**Thigpen and Cleckley (multiple personality disorder)**
**Billington et al (empathising and systemising) [10]**

No marks for description of study.

No answer or incorrect answer [0]

Anecdotal discussion, brief detail, minimal focus. Very limited range. Evaluation may be inaccurate, incomplete or muddled. [1–3]

*Either* points illustrating individual differences lack depth and/or breadth *or* relevant points are considered without contrast to alternatives. The answer is general rather than focused on study but shows some understanding. [4–5]

Points illustrating the contribution of the study to the investigation of individual differences are considered although they may lack breadth or depth. The answer shows good discussion with reasonable understanding. [6–7]

The contribution of the study to the investigation of individual differences is clear and detailed and there is contrast to alternatives. Discussion shows good understanding and clear expression. [8–10]

Examples of possible discussion points:

**Rosenhan**
- people are *similar* in the sense that both nurses and clinicians, in all hospitals tested, made the same kinds of mistakes
- diagnosing individual differences in mental health is difficult because judgments are affected by context
- although this applies more to professionals (e.g. the psychiatrists) than to others (e.g. the patients)

**Thigpen and Cleckley**
- people usually only have one personality, Eve had three
- evidence for this e.g. IQ differences
- people can usually recall what they have been doing, but Eve didn't know what her other personalities had done

**Billington et al**
- males tend to be higher systemisers, females lower
- females tend to be higher empathisers, males lower
- but there is overlap on both scales
- independent of sex, typically S>E for physical science students, reverse for humanities students

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