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PSYCHOLOGY **9990/42**

Paper 4 Specialist Options: Application and Research Methods **May/June 2024**

MARK SCHEME

Maximum Mark: 60

Published

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.

Mark schemes should be read in conjunction with the question paper and the Principal Examiner Report for Teachers.

Cambridge International will not enter into discussions about these mark schemes.

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Generic Marking Principles

These general marking principles must be applied by all examiners when marking candidate answers. They should be applied alongside the specific content of the mark scheme or generic level descriptions for a question. Each question paper and mark scheme will also comply with these marking principles.

GENERIC MARKING PRINCIPLE 1:

Marks must be awarded in line with:

- the specific content of the mark scheme or the generic level descriptors for the question
- the specific skills defined in the mark scheme or in the generic level descriptors for the question
- the standard of response required by a candidate as exemplified by the standardisation scripts.

GENERIC MARKING PRINCIPLE 2:

Marks awarded are always **whole marks** (not half marks, or other fractions).

GENERIC MARKING PRINCIPLE 3:

Marks must be awarded **positively**:

- marks are awarded for correct/valid answers, as defined in the mark scheme. However, credit is given for valid answers which go beyond the scope of the syllabus and mark scheme, referring to your Team Leader as appropriate
- marks are awarded when candidates clearly demonstrate what they know and can do
- marks are not deducted for errors
- marks are not deducted for omissions
- answers should only be judged on the quality of spelling, punctuation and grammar when these features are specifically assessed by the question as indicated by the mark scheme. The meaning, however, should be unambiguous.

GENERIC MARKING PRINCIPLE 4:

Rules must be applied consistently, e.g. in situations where candidates have not followed instructions or in the application of generic level descriptors.

GENERIC MARKING PRINCIPLE 5:

Marks should be awarded using the full range of marks defined in the mark scheme for the question (however; the use of the full mark range may be limited according to the quality of the candidate responses seen).

GENERIC MARKING PRINCIPLE 6:

Marks awarded are based solely on the requirements as defined in the mark scheme. Marks should not be awarded with grade thresholds or grade descriptors in mind.

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Social Science-Specific Marking Principles (for point-based marking)

1 Components using point-based marking:

- Point marking is often used to reward knowledge, understanding and application of skills. We give credit where the candidate's answer shows relevant knowledge, understanding and application of skills in answering the question. We do not give credit where the answer shows confusion.

From this it follows that we:

a DO credit answers which are worded differently from the mark scheme if they clearly convey the same meaning (unless the mark scheme requires a specific term)

b DO credit alternative answers/examples which are not written in the mark scheme if they are correct

c DO credit answers where candidates give more than one correct answer in one prompt/numbered/scaffolded space where extended writing is required rather than list-type answers. For example, questions that require *n* reasons (e.g. State two reasons …).

d DO NOT credit answers simply for using a 'key term' unless that is all that is required. (Check for evidence it is understood and not used wrongly.)

e DO NOT credit answers which are obviously self-contradicting or trying to cover all possibilities

f DO NOT give further credit for what is effectively repetition of a correct point already credited unless the language itself is being tested. This applies equally to 'mirror statements' (i.e. polluted/not polluted).

g DO NOT require spellings to be correct, unless this is part of the test. However spellings of syllabus terms must allow for clear and unambiguous separation from other syllabus terms with which they may be confused (e.g. Corrasion/Corrosion).

2 Presentation of mark scheme:

- Slashes (/) or the word 'or' separate alternative ways of making the same point.
- Semi colons (;) bullet points (•) or figures in brackets (1) separate different points.
- Content in the answer column in brackets is for examiner information/context to clarify the marking but is not required to earn the mark (except Accounting syllabuses where they indicate negative numbers).

3 Calculation questions:

- The mark scheme will show the steps in the most likely correct method(s), the mark for each step, the correct answer(s) and the mark for each answer.
- If working/explanation is considered essential for full credit, this will be indicated in the question paper and in the mark scheme. In all other instances, the correct answer to a calculation should be given full credit, even if no supporting working is shown.
- Where the candidate uses a valid method which is not covered by the mark scheme, award equivalent marks for reaching equivalent stages.
- Where an answer makes use of a candidate's own incorrect figure from previous working, the 'own figure rule' applies: full marks will be given if a correct and complete method is used. Further guidance will be included in the mark scheme where necessary and any exceptions to this general principle will be noted.

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4 Annotation:

- For point marking, ticks can be used to indicate correct answers and crosses can be used to indicate wrong answers. There is no direct relationship between ticks and marks. Ticks have no defined meaning for levels of response marking.
- For levels of response marking, the level awarded should be annotated on the script.
- Other annotations will be used by examiners as agreed during standardisation, and the meaning will be understood by all examiners who marked that paper.

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Generic levels of response marking grids

Table A: AO2 Application

The table should be used to mark the 10 mark 'Plan a study' **Questions (9, 10, 11** and **12)**.

Level	Description	Marks
5	The response: • uses an appropriate method as required by the question • describes a good range of appropriate method-specific features with accurate detail • describes a good range of appropriate general methodological features with accurate detail • shows very good understanding and the plan is coherent and is sufficient for replication • clearly applies knowledge of psychological methodology and terminology involved in planning a study • uses and shows good understanding of ethical guidelines.	9–10
4	The response: • uses an appropriate method as required by the question • describes a range of appropriate method-specific features in detail • describes a range of appropriate general methodological features with some in detail • shows good understanding and the plan is coherent • applies knowledge of psychological methodology and terminology involved in planning a study • uses ethical guidelines appropriately.	7–8
3	The response: • uses an appropriate method as required by the question • describes a range of appropriate method-specific features although these may lack detail • describes some general methodological features although these may lack detail • shows limited understanding and the plan has some coherence • applies some knowledge of psychological methodology and terminology involved in planning a study • refers to ethical guidelines.	5–6
2	The response: • uses an appropriate method as required by the question • identifies (lists) some appropriate method-specific features • identifies (lists) a limited range of appropriate general methodological features • shows little understanding and the plan would be difficult or impossible to replicate • makes some attempt to apply knowledge of psychological methodology and terminology involved in planning a study • ethical guidelines listed or absent.	3–4

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Level	Description	Marks
1	The response: • may not use the method required by the question • may not answer the question set • identifies a few general and/or method-specific features and detail is limited • shows very little understanding and the plan would be impossible to replicate • makes a limited attempt to apply knowledge of psychological methodology and terminology involved in planning a study.	1–2
0	• No response worthy of credit • The candidate describes the study listed on the syllabus • The plan is unethical.	0

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Section A

Question	Answer	Marks
1	**From the key study by Lovell et al. (2006) on the treatment of obsessive-compulsive disorder:**	
1(a)(i)	**Identify <u>two</u> criteria that were necessary for participants to meet to be included in the study.** **Syllabus: 1.5.3** Key study on treatment of obsessive-compulsive disorder using telephone administered cognitive- behavioural therapy (CBT): Lovell et al. (2006). Award 1 mark for each appropriate reason. Definitive answer: • diagnosis of obsessive-compulsive disorder • score of 16 or more on YBOCS (Yale-Brown scale) • age 16–65.	**2**
1(a)(ii)	**Outline <u>two</u> reasons why some participants were excluded from the study.** Award 1 mark for each appropriate reason. Definitive answer: patients with: • obsessional slowness • organic brain disease • a diagnosis of substance misuse • severe depression or with suicidal intent • patients who had been on anti-depressants or anxiolytics for less than 3 months. **NOTE:** 0 marks for 'withdrawing from study'; 0 marks for 'mixing/doubling up' with **Q1(a)(i)**	**2**
1(b)	**Suggest why Lovell et al. did <u>not</u> include a control group in their study.** Award 2 marks for an appropriate suggestion stated and applied to study with detail / elaboration / example. Award 1 mark for an appropriate suggestion identified but not applied. Answers may include: • a control group was not needed (1) the aim was to see if CBT by telephone was as good as face-to-face; both groups receiving CBT (2) • a control group would receive no treatment (1) and if they were to be an appropriate control group they would have to meet the same inclusion criteria as the experimental groups (2). Other appropriate responses to be credited.	**2**

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Question	Answer	Marks
1(c)	**Explain <u>two</u> strengths of excluding some participants from studies on obsessive-compulsive disorder (OCD).** Up to 2 marks for each strength × 2. Award 2 marks for an appropriate strength stated and applied as required by the question with detail / elaboration / example. Award 1 mark for an appropriate strength/ stated but not applied. Answers may include: • maintains ethical guidelines (protection from psychological harm) the participant may not be suitable for the treatment (1) and it may do their OCD more harm that good, particularly if they are undergoing an alternative treatment (2) • maintains ethical guidelines (protection from psychological harm) the treatment may not be suitable for the participant (1) a participant may have a problem regarding telephones; they may have hearing problems; may not have a telephone (2) • 'telephone treatment' was 50% shorter than a face-to-face consultation (1) so this should only be done with suitable OCD participants not those who need longer sessions or face-to-face to help them (2). Other appropriate responses to be credited.	**4**

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Question	Answer	Marks
2	**Kleptomania can be assessed using the Kleptomania Symptom Assessment Scale (K-SAS).**	
2(a)	**State <u>one</u> question used on the K-SAS.** **Syllabus** 1.3.1 measure of impulse control disorders: Kleptomania Symptom Assessment Scale (K-SAS). Award 1 mark for partial answer. Award 2 marks for full answer. Definitive answer: 1 If you had urges to steal during the past WEEK, on average, how strong were your urges? During the past WEEK, 2 how many times did you experience urges to steal? 3 how many hours (add up hours) were you preoccupied with your urges to steal? 4 how much were you able to control your urges? 5 how often did thoughts about stealing come up? 6 approximately how many hours (add up hours) did you spend thinking about stealing? 7 how much were you able to control your thoughts of stealing? 8 on average, how much tension or excitement did you have shortly before you committed a theft? If you did not actually steal anything, please estimate how much anticipatory tension or excitement you believe you would have experienced, if you had committed a theft. 9 on average, how much excitement and pleasure did you feel when you successfully committed a theft? If you did not actually steal, please estimate how much excitement and pleasure you believe you would have experienced if you had committed a theft. 10 how much emotional distress (mental pain or anguish, shame, guilt, embarrassment) has your stealing caused you? 11 how much personal trouble (relationship, financial, legal, job, medical or health) has your stealing caused you? 12 how many times did you steal? **NOTE:** marks awarded for 'closed question responses' i.e. scale to answer question. See attached.	**2**

Question	Answer	Marks
2(b)	**Suggest <u>one</u> way that the reliability of the K-SAS could be tested.** Award 2 marks for an appropriate suggestion stated and applied to study with detail / elaboration / example. Award 1 mark for an appropriate suggestion identified but not applied. Answers may include: • Test-retest where the test is repeated at a later date (1). The K-SAS could be given to the same participant on different occasions (2). • The split-half method involves splitting the test into two and administering each half of the test to the same person. (1) The K-SAS scores from the two halves should show a strong correlation (2). **Note:** 0 marks for inter-rater reliability. Other appropriate responses to be credited.	**2**
2(c)	**Explain <u>two</u> weaknesses of the K-SAS.** Up to 2 marks for each weakness x 2. Award 2 marks for an appropriate weakness stated and applied as required by the question with detail / elaboration / example. Award 1 mark for an appropriate weakness stated but not applied. Answers may include: • the wording of some questions is ambiguous (1) e.g. **Q6** uses 'approximately' how many hours (2). • it requires the participant to think retrospectively about their thoughts/behaviours and they might not be able to remember (1) so it uses words like 'approximately' which is not very precise (2) • some rating scales are ambiguous (1) **Q6** for example, has 1–4 hours and then 4–10 hours, the two overlapping (2) • there are different rating scales for each question (1) and this may confuse, perhaps a carry over from a previous question/answer leading to an incorrect rating (2). • No qualitative data gathered, so no 'why' (1) example any K-SAS question (2). **NOTE:** 0 marks for response bias/social desirability (participant bias, not K-SAS). Other appropriate responses to be credited.	**4**

Question	Answer	Marks
3	**From the key study by Snyder and DeBono (1985) on consumer personality and advertising:**	
3(a)	**Describe the procedure of study 3.** **Syllabus:** 2.5.2 Key study on consumer personality and advertising: Snyder and DeBono (1985), focus on study 3, specifics of methodology for study 1 and study 2 will not be needed. Award 4 marks for a detailed explanation decreasing to 1 mark for a partial explanation. Definitive answer: • participant called using telephone • explanation of reason for study (shampoo) • one of two messages randomly allocated (i) image message or (ii) quality message • two questions asked (i) willingness to use shampoo 5-point scale (definitely not to definitely yes) (ii) willingness to try shampoo in percentages 0% not at all to 100% definitely willing. **NOTE:** 0 marks for sample/sampling technique or assessing self-monitoring score	**4**
3(b)	**Suggest how <u>one</u> ethical guideline was broken in study 3.** Award 2 marks for an appropriate suggestion and applied to study with detail / elaboration / example. Award 1 mark for an appropriate suggestion but not applied. Answers may include: • no **deception** was broken (1) the researchers (i) gave a false name, (ii) claimed that they were working for a marketing research firm, (iii) claimed they were researching a shampoo • no full **informed consent** (1) because the researchers claimed the study was about shampoo, when it wasn't (2). **NOTE**: there is no harm; a debrief was given "researchers answered any questions they had"; there is no mention about right to withdraw, so no evidence that this guideline was broken.	**2**

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Question	Answer	Marks
3(c)	**Explain <u>one</u> strength and <u>one</u> weakness of using a telephone interview to investigate 'consumer personality and advertising'.** Up to 2 marks for each strength and up to 2 marks for each weakness: Award 2 marks for an appropriate strength/weakness stated and applied as required by the question with detail / elaboration / example. Award 1 mark for an appropriate strength/weakness stated but not applied. Answers may include: Strengths: • an interview is with a person themselves so they know about their needs (1) so they can answer questions about themselves, and their advertising likes and dislikes (2) • using a telephone means that a potentially representative sample can be contacted (1) and so the advertising preferences of a diverse sample of participants can be investigated (2). Weaknesses: • questions need to be short/rating scales simple (1) so full analysis/gathering extensive data about personality or advertising preferences will not be possible (2) • the drop-out rate for telephone interviews is quite high (1) and so what is said about their personality or advertising preferences may not be detailed or may not be complete (2) • cannot see non-verbal responses to questions (1) which may provide useful information about personality or advertising preferences (2). Other appropriate responses to be credited.	**4**

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Question	Answer	Marks
4	**The central gaze cascade effect in positioning a product has been investigated using eye-tracking.**	
4(a)	**Outline the findings of <u>one</u> study that has used eye-tracking to investigate the central gaze cascade effect (e.g. Atalay et al., 2012).** **Syllabus**: 2.4.1 attention and shelf position including planograms, central gaze cascade effect, use of eye-tracking, including a study, e.g. Atalay et al. (2012). **Marks**: Award 2 marks for a detailed outline. Award 1 mark for a partial outline. Answers may include: • A centrally located brand within a product category is chosen more often even when it is not placed in the centre of the shelf or the visual field (2). • [Atalay study] horizontal centrality on choice was found across three different studies and product categories (vitamins, meal replacement bars, and energy drinks) (2). • Brands in the horizontal centre receive more visual attention (1). • There is an initial central fixation bias, a tendency to look first at the central option (1), and a central gaze cascade effect, progressively increasing attention focused on the central option right prior to decision (2). • A product is more likely to sell if it is placed centrally on a shelf (1). Other appropriate responses to be credited.	**2**
4(b)	**Suggest <u>one</u> way to investigate the central gaze cascade effect, other than using eye-tracking.** Award 2 marks for an appropriate suggestion stated and applied to study with detail / elaboration / example. Award 1 mark for an appropriate suggestion identified but not applied. Answers may include: • Conduct an experiment (type) (1) and ask participants to choose an item from a shelf where there is a central item (2). • Give a questionnaire or interview (format and/or technique) (1) to ask participants where they first look when looking at a product on a shelf (2). • Conduct an observation (at least one of: covert, structured, controlled, non-participant) (1) with various product layouts to investigate which item is chosen (2). **NOTE:** EOG acceptable (if justified); EEG and fMRI 0 marks as cannot measure eye movement Other appropriate responses to be credited.	**2**

Question	Answer	Marks
4(c)	**Explain <u>two</u> weaknesses of using eye-tracking to investigate the central gaze cascade effect.** Up to 2 marks for each weakness × 2. Award 2 marks for an appropriate weakness stated and applied as required by the question with detail / elaboration / example. Award 1 mark for an appropriate weakness stated but not applied. Answers may include: • participants can choose to look in whatever direction they wish – they know their eye movements are being tracked (1) and so data on central gaze is false (2) • there may be cultural differences in where people are socialised to look (1) so generalisations about central gaze cannot be made (2) • data gathered is where the participant has looked but it does not provide an explanation of why that person has looked in a particular direction (2) which restricts the evidence of why people look centrally (2). Other appropriate responses to be credited.	**4**

Question	Answer	Marks
5	**From the key study by Brudvik et al. (2016) on pain assessments by doctors, parents and children:**	
5(a)(i)	**Outline <u>one</u> rating scale completed by the 3–8-year-old children.** **Syllabus:** 3.3.2 Key Study on comparing pain assessments by doctors, parents and children: Brudvik et al. (2016). **Marks**: Award 2 marks for a detailed outline. Award 1 mark for a partial outline. **Definitive answers:** • the Wong-Baker Faces Pain Rating Scale (1) which has 6 faces showing 0–10 increasing levels of pain (2) • the Faces Pain Scale (FPS-R) (1) which also has 6 faces with a 0–10 scale (0, 2, 4, 6, 8, 10) (2).	**2**
5(a)(ii)	**Outline <u>one</u> rating scale completed by the 9–15-year-old children.** Award 2 marks for a detailed outline. Award 1 mark for a partial outline. **Definitive answers:** • the Visual Analogue Scale (VAS) (1) often a line drawn on paper with a severity scale. Like the 'Coloured' below, but without colours (2) • the Coloured Analogue Scale (CAS) (1) which has a line on a piece of paper with pain severity ranging from 0 (green) to 100 (red) (2)	**2**

Question	Answer	Marks
5(b)	**Suggest <u>one</u> way in which a child's pain can be assessed, other than using a rating scale.** Award 2 marks for an appropriate suggestion stated and applied to study with detail / elaboration / example. Award 1 mark for an appropriate suggestion identified but not applied. Answers may include: • by using a clinical interview (1) the child can be asked questions (at a young child's level) such as 'point to where it hurts' (2) • by observing the child's behaviour (1) such as whether they are crying, limping, holding an area (2). **NOTE:** 0 marks for MPQ (because it is for adults); 0 marks for PPQ (which is for children but uses a rating scale). Other appropriate responses to be credited.	**2**
5(c)	**Explain <u>two</u> weaknesses with the rating scales used by the 3–8-year-old children.** Up to 2 marks for each weakness × 2. Award 2 marks for an appropriate weakness stated and applied as required by the question with detail / elaboration / example. Award 1 mark for an appropriate weakness stated but not applied. Answers may include: • children might be in too much pain (1) to want to complete a rating scale such as the Wong-Baker faces scale (2) • children may not understand what they are required to do (1) • the measure is not valid (1) the 'smiley face' may not translate into actual pain or the type of pain the child is experiencing (2) • the smiley face may not be reliable (1), but then again, the level of pain can also change (2). **NOTE:** 0 marks for response bias/social desirability (participant bias, not rating scale) Other appropriate responses to be credited.	**4**

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Question	Answer	Marks
6	**Stress can be measured using sample tests for salivary cortisol, e.g. in the study by Evans and Wener (2007).**	
6(a)	**Outline the procedure of <u>one</u> study that measured stress using salivary cortisol.** **Syllabus** 3.4.2 sample tests for salivary cortisol, including a study, e.g. Evans and Wener (2007). Award 2 marks for a detailed outline. Award 1 mark for a partial outline. Answers may include: • Evans and Wener (2007) studied 139 men and women travelling from home to work on a train journey. Salivary cortisol was collected at the end of the journey and at the participants home the following weekend. A participant dribbles into a salivette to collect cortisol, which appears in saliva. Other appropriate responses to be credited.	**2**
6(b)	**Collecting saliva to test from some groups of participants, such as children, can be difficult.** **Suggest how salivary cortisol tests could be conducted with children.** **Your suggestion must be ethical.** Award 2 marks for an appropriate suggestion stated and applied to study with detail / elaboration / example. Award 1 mark for an appropriate suggestion identified but not applied. Answers may include: • they can spit into a salivette (1) just like adults and it can be done in different situations (2) • they can 'play a game' (1) • they can 'clear their throat' (1) and spit into some receptacle (2) Other appropriate responses to be credited.	**2**

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Question	Answer	Marks
6(c)	**Explain <u>two</u> strengths of using a biological measure, such as salivary cortisol, to measure stress.** Up to 2 marks for each strength × 2 Award 2 marks for an appropriate strength stated and applied as required by the question with detail / elaboration / example. Award 1 mark for an appropriate strength stated but not applied. Answers may include: • provides objective ('factual') data (1) so accurate assessment of cortisol levels can be known (2) • the test is reliable (same test repeated on every person) (1) so accurate numbers on cortisol levels (2) • the test is valid (measures cortisol) (1) if a person is stressed high levels will be shown (2) Other appropriate responses to be credited.	**4**

Question	Answer	Marks
7	**The key study by Landry et al. (2019) on applying self-determination theory to motivational rewards included a 'manipulation check' as part of the procedure in study 1.**	
7(a)	**Describe the conditions of the independent variable used in study 1.** **Syllabus: 4.1.3** Key study for applying self-determination theory to motivational rewards: Landry et al. (2019), focus on study 1, specifics of methodology from study 2 will not be needed. Award 1 mark for identification of IV plus 1 mark for description of it × 2. **Answers to include:** • **Autonomy supporting** (1) Includes a description of the reward presented in an informational and encouraging way. Leads to need satisfaction/higher intrinsic motivation. For example: "the monetary reward was offered to them as a token of appreciation for their contribution" (2). • **Autonomy controlling/threatening** (1) Includes a description of the reward presented in an autonomy threatening and pressuring way to convey a controlling meaning. Leads to need frustration/higher extrinsic motivation. For example: "the monetary reward was used as a mean to reinforce the performance standards for the task at hand" (2).	**4**

Question	Answer	Marks
7(b)	**Suggest <u>one</u> effect on the results if a manipulation check had <u>not</u> been included in study 1.** Award 2 marks for an appropriate suggestion stated and applied to study with detail / elaboration / example. Award 1 mark for an appropriate suggestion identified but not applied. Answers may include: • the conditions of the IV may not be valid (1) e.g. the autonomy supporting and the autonomy controlling not measure what they claim (2) • one condition may have produced the desired aim but the other may not (1) e.g. the autonomy supporting and the autonomy controlling (2) **NOTE**: the question does not ask for details of how the manipulation check was done. Other appropriate responses to be credited.	**2**
7(c)	**Explain <u>one</u> strength and <u>one</u> weakness of the experimental design used in study 1.** Up to 2 marks for strength and up to 2 marks for each weakness. Award 2 marks for an appropriate strength/weakness stated and applied as required by the question with detail / elaboration / example. Award 1 mark for an appropriate strength/weakness stated but not applied. Answers may include: Strengths: • An independent design means that the participant only participates in one condition so there are no order effects. (1) For example the participant does either the supporting or the controlling condition (2). • As participants only participates in one condition of the IV the potential effect of demand characteristics is reduced (1). For example the participant does either the supporting or the controlling condition (2). Weaknesses: • Participant variables are more likely to affect the DV; people are different (1) so if two people are directly compared from the supporting or the controlling condition the result might be due to a difference in them rather than the IV (2). • More participants are needed compared to repeated measures (1) so 20 participants (rather than 10) are needed for 10 sets of data (2). **NOTE:** The design used in study 1 was independent groups. Other appropriate responses to be credited.	**4**

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Question	Answer	Marks
8	**Muczyk and Reimann proposed four styles of leader behaviour.**	
8(a)	**Outline the 'directive autocrat' style of leader behaviour proposed by Muczyk and Reimann.** **Syllabus:** 4.2.2 Muczyk and Reimann's four styles of leader behaviour. Award 2 marks for a detailed outline. Award 1 mark for a partial outline. Definitive answer: • style includes participation (low) and direction (high) (1) • leader makes unilateral decisions, which will be carried out by workers, subordinate to them, and who have no involvement in the decision-making process (+1) • instructs on how tasks are completed, supervises workers closely, checks progress (+1)	**2**
8(b)	**Suggest <u>one</u> closed question that a leader could be asked to investigate whether they have a directive autocrat style of leader behaviour.** Award 2 marks for an appropriate suggestion and applied to study with detail / elaboration / example. Award 1 mark for an appropriate suggestion identified but not applied. Answers may include: • Do you make unilateral decisions without consulting workers? (1) yes/no (2) • Do you supervise workers closely? (1) Always, sometimes, never (2) **NOTE**: open-ended questions receive no marks; 1 mark if no answer format. Other appropriate responses to be credited.	**2**

Question	Answer	Marks
8(c)	**Explain <u>two</u> strengths of using a structured observation to investigate the behaviour of a directive autocrat leader.** Up to 2 marks for each strength × 2. Award 2 marks for an appropriate strength stated and applied as required by the question with detail / elaboration / example. Award 1 mark for an appropriate strength stated but not applied. Answers may include: • Using a structured observation behavioural categories can be defined before the study begins (1) meaning that the category for 'supervises workers closely' should be added (2). • Using a covert observation means that the leader is unaware that their behaviour is being observed (1) and so any supervisory behaviour is genuine (2). • Using a structured, covert observation means that two observers can be used to check the extent of agreement about behaviours (1) so good inter-rater reliability would confirm that a leader supervises worker behaviour at frequent intervals (2). Other appropriate responses to be credited.	**4**

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<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>9(a)</td><td>
Plan a study using a questionnaire with closed questions to investigate the effectiveness of using imaginal desensitisation for treating pyromania.

Your plan must include details about:
• questionnaire technique
• rating scale.

Use Table A: AO2 Application to mark candidate responses to this question.
Credit both general features and specific features of the plan.

<table>
<tr>
<td>The specific features of the plan <u>should</u> include:
• technique (paper/pencil, online, postal)
• format (open and/or closed)
• examples of questions
• question scoring/interpretation
• number of questions</td>
<td>The general features of the plan <u>should</u> include (if appropriate):
• sample and sampling technique
• ethical guidelines
• a procedure
• the location
• type of data, analysis of data, use of descriptive statistics
• an aim or hypothesis (directional or non-directional)/null hypothesis
• steps for making the study valid and reliable</td>
</tr>
</table>

Credit other elements of the plan as appropriate using the marking grid.
</td><td>10</td></tr>
</table>

<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>9(b)</td><td colspan="2">For <u>one</u> piece of psychological knowledge on which your plan is based:</td></tr>
<tr><td>9(b)(i)</td><td>Describe this psychological knowledge.

Syllabus: 1.3.1 diagnostic criteria (ICD-11) of impulse control disorders: – kleptomania – pyromania – gambling disorder.

Syllabus: 1.3.3 psychological (cognitive-behavioural) therapies including: – imaginal desensitisation, including a study, e.g. Blaszczynski and Nower (2003).

Description:
1 Diagnostic criteria for ICD (inc pyromania) example: a recurrent failure to control strong impulses to set fires, resulting in multiple acts of, or attempts at, setting fire to property or other objects; lack of an apparent motive for the acts of, or attempts at, fire setting; persistent fascination or preoccupation with fire and related stimuli (e.g. watching fires, building fires, fascination with firefighting equipment).
2 Treatment of imaginal desensitisation e.g. Blaszczynski and Nower (2003). It involves teaching progressive muscle relaxation and then the person visualises themselves being exposed to the situation that triggers the drive to carry out the impulsive behaviour.

<table>
<tr><td>Marks</td><td>Description</td></tr>
<tr><td>3–4</td><td>The knowledge is appropriate. Relevant points are correctly described in good detail.</td></tr>
<tr><td>1–2</td><td>Basic points are identified with some elaboration and understanding. The answer lacks detail (a sentence or two).</td></tr>
<tr><td>0</td><td>No creditable response.</td></tr>
</table>
</td><td>4</td></tr>
</table>

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<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>9(b)(ii)</td><td>Explain how you used <u>two</u> features of this psychological knowledge to plan your study.

Candidates should explain how the psychological knowledge described in (b)(i) has informed their plan in part (a).

For each feature:
<table><tr><td>Marks</td><td>Description</td></tr><tr><td>2</td><td>Suitable answer that relates a feature and explains how the feature was used, expanded or modified to make it appropriate to the plan. The knowledge has clearly been applied to the plan.</td></tr><tr><td>1</td><td>Basic answer that identifies a feature.</td></tr><tr><td>0</td><td>No creditable response.</td></tr></table>
Example: participants treated with imaginal desensitisation. After treatment given online questionnaire with closed questions e.g. Have your urges to set a fire since treatment been: Scale 1–4 (1–4 very strong/strong/weak/very weak).</td><td></td></tr>
<tr><td>9(c)(i)</td><td>Explain <u>one</u> reason for your choice of questionnaire technique.

Candidates should use the questionnaire technique stated in (a).
Award 2 marks if an appropriate reason is given and justified.
Award 1 mark if an appropriate reason is given but not justified.

Example:
Paper/pencil
• because they are face-to-face perhaps participants are more likely to complete the questionnaire and perhaps be more honest in their answers (1) related to plan (2)
• paper/pencil because the researcher is there at the time watching and waiting and so the environment is perhaps more likely to be controlled if done in a laboratory with students for example (1) related to plan (2).

Online
• online because the sample size can be much larger and potentially much more diverse than paper/pencil or face-to-face which is probably done in a relatively restricted place (in street, laboratory) related to plan (2)
• online because there is no researcher waiting, watching or influencing the person in any way. The participant is more likely to be honest in their responses related to plan (2).

Postal
• postal because the sample size can be much larger and potentially much more diverse than paper/pencil or face-to-face which is probably done in in a relatively restricted place (in street, laboratory) (1) related to plan (2)
• postal because there is no researcher waiting, watching or influencing the person in any way. The participant is more likely to be honest in their responses (1) related to plan (2).</td><td>2</td></tr>
</table>

<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>9(c)(ii)</td><td>Explain <u>one</u> weakness of your choice of questionnaire technique.

Candidates should use the questionnaire technique stated in (c)(i)
<table>
<tr><td>Marks</td><td>Description</td></tr>
<tr><td>2</td><td>Weakness is given and applied to the plan.</td></tr>
<tr><td>1</td><td>Weakness is given without being applied to the plan.</td></tr>
<tr><td>0</td><td>No creditable response.</td></tr>
<tr><td>Example</td><td>• online means that the participant is perhaps more likely to drop-out without completing the questionnaire (right to withdraw) (1) related to plan (2)
• paper-pencil/face-to-face means that the participant may be more likely to respond to demand characteristics and ‘say what they think the researcher wants them to say’ (1) related to plan (2)
• postal means that the questionnaire can be treated like ‘junk-mail’ and thrown away; it could be started and then forgotten; it may not be returned because that may incur costs for the participant (1) related to plan (2).</td></tr>
</table></td><td>2</td></tr>
<tr><td>9(c)(iii)</td><td>Explain <u>one</u> reason for your choice of rating scale.

Candidates should use the question scoring/interpretation stated in (a).

Award 2 marks if an appropriate reason is given and justified.
Award 1 mark if an appropriate reason is given but not justified.

Example:
• a scale was used because each participant’s score could be compared to other participants (1) related to plan (2)
• quantitative data was gathered because it allowed statistical analysis (1) related to plan (2)
• a fixed choice scale was chosen so a participant could not ‘opt-out’ and give a neutral answer (1) related to plan (2).</td><td>2</td></tr>
</table>

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<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>10(a)</td><td>Plan a study using a face-to-face interview to investigate the effectiveness of the ‘disrupt-then-reframe’ sales technique.

Your plan must include details about:
• question format
• sampling technique.

Use Table A: AO2 Application to mark candidate responses to this question.
Credit both general features and specific features of the plan.
<table><tr><td>The specific features of the plan <u>should</u> include:
• interview technique (telephone or face-to-face)
• interview format (structured, unstructured, semi-structured)
• question format (open and/or closed)
• examples of questions
• question scoring/interpretation
• number of questions</td><td>The general features of the plan <u>should</u> include (if appropriate):
• sample and sampling technique
• ethical guidelines
• a procedure
• the location
• type of data, analysis of data, use of descriptive statistics
• an aim or hypothesis (directional or non-directional)/null hypothesis
• steps for making the study valid and reliable</td></tr></table>
Credit other elements of the plan as appropriate using the marking grid.</td><td>10</td></tr>
<tr><td>10(b)</td><td>For <u>one</u> piece of psychological knowledge on which your plan is based:</td><td></td></tr>
<tr><td>10(b)(i)</td><td>Describe this psychological knowledge.

Syllabus: 2.4.2. interpersonal influence techniques; focusing on disrupt-then-reframe including the need for cognitive closure and factors affecting the need for cognitive closure, including a study, e.g. Kardes et al. (2007).

Description: The disrupt-then-reframe (DTR) technique (Kardes et al., 2007) involves deliberately confusing consumers with a disruptive message (or confusing information) and then re-wording (reframing) in a much clearer way so the consumer understands what is being said and is happy. This reduces the number of counter-arguments and can close a sale. This technique is said to work because the consumer has a need for ‘cognitive closure’ (NFCC), i.e. resolving the ambiguity rather than it being left ambiguous.

<table><tr><td>Marks</td><td>Description</td></tr><tr><td>3–4</td><td>The knowledge is appropriate. Relevant points are correctly described in good detail.</td></tr><tr><td>1–2</td><td>Basic points are identified with some elaboration and understanding. The answer lacks detail (a sentence or two).</td></tr><tr><td>0</td><td>No creditable response.</td></tr></table></td><td>4</td></tr>
</table>

<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>10(b)(ii)</td><td>Explain how you used <u>two</u> features of this psychological knowledge to plan your study.

Candidates should explain how the psychological knowledge described in (b)(i) has informed their plan in part (a). For each feature:

<table>
<tr><td>Marks</td><td>Description</td></tr>
<tr><td>2</td><td>Suitable answer that relates a feature and explains how the feature was used, expanded or modified to make it appropriate to the plan. The knowledge has clearly been applied to the plan.</td></tr>
<tr><td>1</td><td>Basic answer that identifies a feature.</td></tr>
<tr><td>0</td><td>No creditable response.</td></tr>
</table>

Example: Use opportunity sample participants who go to a store and who are given the DTR technique. Ask closed question: ‘Did you purchase the item? Yes/No Ask open question: Describe your thoughts about the technique used by the sales assistant.</td><td>4</td></tr>
<tr><td>10(c)(i)</td><td>Explain <u>one</u> reason for your choice of question format.

Candidates should use the question format stated in (a).

Award 2 marks if an appropriate reason is given and justified.
Award 1 mark if an appropriate reason is given but not justified.

Example:
open questions:
• the data gathered may be ‘rich’ and detailed (1) related to plan (2)
• it allows participants the opportunity to express a range of feelings and explain their behaviour (1) related to plan (2)

closed questions:
• answers are in the same format for all participants (1) related to plan (2)
• answers may be easy to score/analyse (1) related to plan (2)
• relatively large numbers of participants can be questioned relatively quickly (1) related to plan (2)</td><td>2</td></tr>
</table>

<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>10(c)(ii)</td><td>Explain <u>one</u> weakness of your choice of question format.

Candidates should use the question format stated in (c)(i).

<table>
<tr><td>Marks</td><td>Description</td></tr>
<tr><td>2</td><td>Weakness is given and applied to the plan.</td></tr>
<tr><td>1</td><td>Weakness is given without being applied to the plan.</td></tr>
<tr><td>0</td><td>No creditable response.</td></tr>
<tr><td>Example</td><td>Open questions:
• participants may not wish to express a range of feelings or explain their behaviour (1) related to plan (2)
Closed questions:
• participants have no opportunity to express a range of feelings or explain their behaviour (1) related to plan (2)</td></tr>
</table></td><td>2</td></tr>
<tr><td>10(c)(iii)</td><td>Explain <u>one</u> reason for your choice of sampling technique.

Candidates should use the sampling technique stated in (a).

Award 2 marks if an appropriate reason is given and justified.
Award 1 mark if an appropriate reason is given but not justified.

Example:
• a random sample was chosen so everyone in the target population has an equal chance of participating (1) related to plan (2)
• an opportunity sample was chosen because large numbers can be obtained relatively more easily than other methods (1) related to plan (2)
• a volunteer sample was chosen because people are willing and more likely to participate (1) related to plan (2)</td><td>2</td></tr>
</table>

<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>11(a)</td><td>Plan a study using a semi-structured interview to investigate whether stress inoculation training is effective.

Your plan must include details about:
• interview technique
• type(s) of data.

Use Table A: AO2 Application to mark candidate responses to this question.
Credit both general features and specific features of the plan.

<table><tr><td>The specific features of the plan <u>should</u> include:
• interview technique (telephone or face-to-face)
• interview format (structured, unstructured, semi-structured).
• question format (open and/or closed)
• examples of questions
• question scoring/interpretation
• number of questions</td><td>The general features of the plan <u>should</u> include (if appropriate):
• sample and sampling technique
• ethical guidelines
• a procedure
• the location
• type(s) of data, analysis of data, use of descriptive statistics
• an aim or hypothesis (directional or non-directional)/null hypothesis
• steps for making the study valid and reliable</td></tr></table>
Credit other elements of the plan as appropriate using the marking grid.</td><td>10</td></tr>
<tr><td>11(b)</td><td>For <u>one</u> piece of psychological knowledge on which your plan is based:</td><td></td></tr>
<tr><td>11(b)(i)</td><td>Describe this psychological knowledge.

Description: Meichenbaum (1985) prevented stress with self-instructional training and stress inoculation therapy. He believed stress was caused because people think about events in catastrophising ways. Stress inoculation training focuses on replacing maladaptive statements with positive, coping statements and relaxation, which leads the person to respond to stress in more positive ways. Stress inoculation training has three stages: Conceptualisation, Skill acquisition and Application and Follow-through.

<table><tr><td>Marks</td><td>Description</td></tr><tr><td>3–4</td><td>The knowledge is appropriate. Relevant points are correctly described in good detail.</td></tr><tr><td>1–2</td><td>Basic points are identified with some elaboration and understanding. The answer lacks detail (a sentence or two).</td></tr><tr><td>0</td><td>No creditable response.</td></tr></table></td><td>4</td></tr>
</table>

<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>11(b)(ii)</td><td>Explain how you used <u>two</u> features of this psychological knowledge to plan your study.

Candidates should explain how the psychological knowledge described in (b)(i) has informed their plan in part (a).

For each feature:
<table><tr><td>Marks</td><td>Description</td></tr><tr><td>2</td><td>Suitable answer that relates a feature and explains how the feature was used, expanded or modified to make it appropriate to the plan. The knowledge has clearly been applied to the plan.</td></tr><tr><td>1</td><td>Basic answer that identifies a feature.</td></tr><tr><td>0</td><td>No creditable response.</td></tr></table>
Example: Using telephone interview, give semi-structured interview after completion of ‘application and follow-through stage’. Ask ‘Did you find the training: excellent/good/not good/useless. Ask ‘Explain why you chose that answer option?</td><td>4</td></tr>
<tr><td>11(c)(i)</td><td>Explain <u>one</u> reason for your choice of interview technique.

Candidates should use the choice of interview technique stated in (a).

Award 2 marks if an appropriate reason is given and justified.
Award 1 mark if an appropriate reason is given but not justified.

Example:
• face-to-face and then non-verbal responses can be noted by the interviewer (1) related to plan (2)
• face-to-face because it is much more ‘personable’ than talking on a telephone (1) related to plan (2)
• telephone because the interview will be short and to the point (1) related to plan (2)
• telephone because a much wider sample can be obtained; because there is no travelling involved by either interviewer or interviewee (1) related to plan (2).</td><td>2</td></tr>
</table>

<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>11(c)(ii)</td><td>Explain <u>one</u> strength of a semi-structured interview in your study.

Candidates should use the interview format stated in (a).

<table>
<tr><td>Marks</td><td>Description</td></tr>
<tr><td>2</td><td>Strength is given and applied to the plan.</td></tr>
<tr><td>1</td><td>Strength is given without being applied to the plan.</td></tr>
<tr><td>0</td><td>No creditable response.</td></tr>
<tr><td>Example</td><td>• interviewer has the potential to gather both quantitative and qualitative data (1) related to plan (2)
• interviewer has the opportunity to ask both fixed questions for comparison and ad hoc questions (1) related to plan (2)</td></tr>
</table></td><td>2</td></tr>
<tr><td>11(c)(iii)</td><td>Explain <u>one</u> reason for your choice of one type of data.

Candidates should use the type of data stated in (a).

Award 2 marks if an appropriate reason is given and justified.
Award 1 mark if an appropriate reason is given but not justified.

Example:
• quantitative data can be statistically analysed by researchers (1) related to plan (2)
• qualitative data can allow participants to provide reasons for their answer (1) related to plan (2)
• both quantitative and qualitative data can be gathered to provide ‘best of both worlds’ (1) related to plan (2)</td><td>2</td></tr>
</table>

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<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>12(a)</td><td>
Plan a study using an online questionnaire to investigate which type of achievement motivation is more likely to motivate workers.

Your plan must include details about:
• question format
• the sample of participants.

Use Table A: AO2 Application to mark candidate responses to this question.
Credit both general features and specific features of the plan.

<table>
<tr>
<td>The specific features of the plan <u>should</u> include:
• technique (paper/pencil, online, postal)
• format (open and/or closed)
• examples of questions
• question scoring/interpretation
• number of questions</td>
<td>The general features of the plan <u>should</u> include (if appropriate):
• sample and sampling technique
• ethical guidelines
• a procedure
• the location
• type of data, analysis of data, use of descriptive statistics
• an aim or hypothesis (directional or non-directional)/null hypothesis
• • steps for making the study valid and reliable</td>
</tr>
</table>

Credit other elements of the plan as appropriate using the marking grid.
</td><td>10</td></tr>
</table>

<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>12(b)</td><td>For one piece of psychological knowledge on which your plan is based:</td><td></td></tr>
<tr><td>12(b)(i)</td><td>Describe this psychological knowledge.

Syllabus: 4.1.1 McClelland’s theory of achievement motivation including need for achievement, affiliation and power.

Description:
Achievement motivation: McClelland’s achievement–motivation theory (1961) suggests that we have three work-related needs: Need for achievement – the need to get a job done, to master a task, to be successful. People want to achieve on the basis of their hard work and effort rather than on the basis of luck. Need for affiliation – the need to be liked and accepted by other people; effort is applied to creating and maintaining social relationships and friendships. Need for power – this concerns being influential in the lives of others and also in the control of others; the need for discipline is important.

<table><tr><td>Marks</td><td>Description</td></tr><tr><td>3–4</td><td>The knowledge is appropriate. Relevant points are correctly described in good detail.</td></tr><tr><td>1–2</td><td>Basic points are identified with some elaboration and understanding. The answer lacks detail (a sentence or two).</td></tr><tr><td>0</td><td>No creditable response.</td></tr></table></td><td>4</td></tr>
<tr><td>12(b)(ii)</td><td>Explain how you used <u>two</u> features of this psychological knowledge to plan your study.

Candidates should explain how the psychological knowledge described in (b)(i) has informed their plan in part (a).

For each feature:
<table><tr><td>Marks</td><td>Description</td></tr><tr><td>2</td><td>Suitable answer that relates a feature and explains how the feature was used, expanded or modified to make it appropriate to the plan. The knowledge has clearly been applied to the plan.</td></tr><tr><td>1</td><td>Basic answer that identifies a feature.</td></tr><tr><td>0</td><td>No creditable response.</td></tr></table>
Example: sample of participants from a food factory: all aged 18-60, have been working for at least three years and want to be managers. Volunteer to take part via online questionnaire. Ask closed question: What motivates you most? Need for achievement, need for affiliation or need for power? Ask open question ‘Explain why you chose that answer option’.</td><td>4</td></tr>
</table>

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<table>
<tr><th>Question</th><th>Answer</th><th>Marks</th></tr>
<tr><td>12(c)(i)</td><td>Explain <u>one</u> reason for your choice of sample of participants.

Candidates should use the sample of participants stated in (a).

Award 2 marks if an appropriate reason is given and justified.
Award 1 mark if an appropriate reason is given but not justified.

Example:
• the number of participants in my study was X because (reason given) (1) and related (2)
• the sex/gender balance of participants in my study was X because (reason given) (1) and related (2)
• the location participants were chosen from in my study was because (reason given) (1) and related (2)
• the type of participants chosen to be in my study was because (reason given) (1) and related (2)
• the age range of participants chosen to be in my study was because (reason given) (1) and related (2)</td><td>2</td></tr>
<tr><td>12(c)(ii)</td><td>Explain <u>one</u> weakness of your choice of sample of participants.

Candidates should use the sample of participants stated in (c)(i).

<table><tr><td>Marks</td><td>Description</td></tr><tr><td>2</td><td>Weakness is given and applied to the plan.</td></tr><tr><td>1</td><td>Weakness is given without being applied to the plan.</td></tr><tr><td>0</td><td>No creditable response.</td></tr><tr><td>Example</td><td>Relevant features:
• the number of participants was too small because (reason given) (1) and related (2)
• the sex/gender balance of participants was imbalanced because (reason given) (1) and related (2)
• the location participants was restricted because (reason given) (1) and related (2)
• The type of participants chosen was restricted because (reason given) (1) and related (2)
• The age range of participants was restricted (reason given) (1) and related (2).</td></tr></table></td><td>2</td></tr>
</table>

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Question	Answer	Marks
12(c)(iii)	**Explain <u>one</u> reason for your choice of question format.** Candidates should use the question format stated in **(a)**. Award 2 marks if an appropriate reason is given and justified. Award 1 mark if an appropriate reason is given but not justified. Example: open questions: • the data gathered may be 'rich' and detailed (1) related to plan (2) • it allows participants the opportunity to express a range of feelings and explain their behaviour (1) related to plan (2). closed questions: • answers are in the same format for all participants (1) related to plan (2) • answers may be easy to score/analyse (1) related to plan (2) • relatively large numbers of participants can be questioned relatively quickly (1) related to plan (2).	**2**

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