

MRCPPsych MCQs and EMQs

Nilika Perera

Consultant in Liaison Psychiatry - Salford

Exam structure

- Paper A, Paper B & CASC
- Paper A is a 3 hour exam worth 200 marks. It comprises approximately:
 - two-thirds multiple choice questions (MCQ) and
 - one-third extended matching item questions (EMI)
- Paper B is a three hour exam worth 200 marks.
 - One third of the paper covers critical review
 - Two thirds of the paper covers clinical topics, of which 30% will be General Adult Psychiatry.

Paper A & B

- **Paper A**
 - Behavioural Science and Sociocultural Psychiatry
 - Human Development
 - Basic Neurosciences
 - Clinical Psychopharmacology
 - Classification and Assessment in Psychiatry
- **Paper B**
 - Organisation and Delivery of Psychiatric Services
 - General Adult Psychiatry
 - Old Age Psychiatry
 - Psychotherapy
 - Child and Adolescent Psychiatry
 - Substance Misuse/Addictions
 - Forensic Psychiatry
 - Psychiatry of Learning Disability
 - Critical Review

General advise

- **Preparation**

- At least / about 4 months before each paper
- Make a timetable for topics – realistic
- Look at when you wont be able revise - Nights, holidays
- Consider other commitments - Children
- Revision groups – if it works for you
- Look at the college website
- Get/Look at someone's revision notes. Don't rely entirely on revision notes. Do your own reading/notes
 - Make lists/ tables

General advise

- Practice questions – identify areas you need to read about
- Old questions – they get repeated
- Brainstorm possible questions
- Look at the topics that come –up
 - Neuropsychology, defence mechanisms, medication side effects, genetics
- Get to grips with statistics; get used to data presented in tables.
 - Know your calculations
- new vocabulary or key definitions, be sure that you understand them

Suggested books / reading

- TRoN
- Oxford text book of psychiatry
- Hilgard's Introduction to Psychology
- Neuroanatomy: An Atlas of Structures, Sections and Systems by Duane E. Haines
- Crash Course Neurology
- Stahl's Essential Psychopharmacology
- Fish's / Sim's – psychopathology
- Maudsley Prescribing Guidelines by David Taylor et al
- Revision Notes in Psychiatry – Puri + Hall
- BNF
- ICD-10
- The Doctor's Guide to Critical Appraisal - Gosall

A few tips

"a guessing strategy is useful to the extent that it beats random guessing"

- Don't waste too much time on any one question – can always come back
- Answer all the questions
- Read the question
 - Sometimes the clue is in the question
- Look at the answers
 - Similar answers
 - Process of elimination
 - Simplify the answers
- Consider attempting the extending matching questions first because they take longer to do.
- Questions with "always" or "never" are usually wrong – not applicable to "all of the above". "none of the above"
- "usually" or "probably." – possible current answers

Questions 1

- A woman complains that she keeps collapsing to the ground every time she hears a loud bang. What is she describing
 - a) Catatonia
 - b) Cataplexy
 - c) Waxy flexibility
 - d) Rigidity
 - e) Catalepsy

Question 2

- What is the elimination half life of fluoxetine?
 - a) 24 hours
 - b) 26 hours
 - c) 30 hours
 - d) 33 hours
 - e) 4-6 days

Question 3

- Which of the following is true regarding varenicline use?
 - a) Based on data from randomised controlled trials varenicline is less effective than bupropion
 - b) Animal studies suggest that it is safe to use in pregnancy
 - c) Patients using varenicline are at an increased risk of suicidal thoughts
 - d) It is indicated in people who are at a high risk for cardiac events
 - e) Courses must last no longer than 4 weeks

Question 4

- A 39-year-old man comes for review. He is on Fluoxetine for depression. Around two days ago he stopped taking the medication and started taking St John's wort. For the past two days he has experienced increased anxiety, sweating, headache and twitching.
 - a) Bipolar disorder
 - b) Malingering
 - c) SSRI discontinuation syndrome
 - d) Serotonin syndrome
 - e) Generalised Anxiety Disorder

Question 5

- Which of the following is used to assess a persons ability to think abstractly?
 - a) Rey-Osterrieth Complex Figure Test
 - b) Millon Clinical Multiaxial Inventory
 - c) Clock Drawing test
 - d) Wisconsin Card Sorting test
 - e) Rorschach ink blot test

Question 1-5

- Answers

Question 1

Similar answers

- A woman complains that she keeps collapsing to the ground every time she hears a loud bang. What is she describing
 - a) Catatonia
 - b) **Cataplexy**
 - c) Waxy flexibility
 - d) Rigidity
 - e) Catalepsy

Cataplexy- is a sudden and transient loss of muscle tone, often triggered by emotions. It is commonly seen in narcolepsy.

Catalepsy- is a nervous condition characterized by muscular rigidity and fixity of posture regardless of external stimuli

Question 2

Similar answers

- What is the elimination half life of fluoxetine?
 - a) 24 hours
 - b) 26 hours
 - c) 30 hours
 - d) 33 hours
 - e) **4-6 days**

24 hours is the elimination half life of paroxetine
26 hours is the elimination half life of sertraline
30 hours is the elimination half life of escitalopram
33 hours is the elimination half life of citalopram

Question 3

Why is it relevant?

- Which of the following is true regarding varenicline use?
 - a) Based on data from randomised controlled trials varenicline is less effective than bupropion
 - b) Animal studies suggest that it is safe to use in pregnancy
 - c) **Patients using varenicline are at an increased risk of suicidal thoughts**
 - d) It is indicated in people who are at a high risk for cardiac events
 - e) Courses must last no longer than 4 weeks

Varenicline is a selective nicotine-receptor partial agonist used as an aid for smoking cessation.

Two large randomised controlled trials found it to be nearly 80% more effective than bupropion. Initial courses could last 12 weeks. It has been observed to exacerbate underlying psychiatric illness including depression and is associated with suicidal thoughts. It's associated with a small, increased risk of certain cardiovascular adverse events

Question 4

clue is in the question

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Serotonin discontinuation syndrome – common symptoms insomnia, nausea, imbalance, sensory disturbances and hyperarousal

Question 5

clue in the
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 - d) **Wisconsin Card Sorting test**
 - e) Rorschach ink blot test

WCST - is used to assess abstract/concrete thinking and how well concepts are formed. The patient is required to sort cards by colour or shape. Similar test – The Goldstein-Scheerer Object Sort Test

Rey-Osterrieth Complex Figure Test – visuo-spatial, memory, planning
Millon Clinical Multiaxial Inventory – personality traits
Rorschach ink blot – looks at personality characteristics.

Back to questions 6-10

- Questions

Question 6

- Which of these symptoms are not measured in the Simpson-Angus Extrapyramidal side effects scale
 - a) Hypersalivation
 - b) Arm drop
 - c) Bradykinesia
 - d) Head drop
 - e) Glabella tap

Question 7

- A 23-year-old man reported being able to smell music after taking a cocktail of illicit drugs.
 - a) Synaesthesia
 - b) Functional hallucination
 - c) Delusional perception
 - d) Command hallucination
 - e) Autoscopy

Question 8

- Which of the following is true regarding lithium's effect on the white cell count?
 - a) It produces a 'left shift'
 - b) It causes an acute reduction in the neutrophil count
 - c) The effect is dose related
 - d) Neutrophil levels are increased
 - e) Lithium must be avoided in patients prescribed clozapine

Question 9

- Which of the following follows an X-linked dominant inheritance pattern?
 - a) Hunter's syndrome
 - b) Alport syndrome
 - c) Neurofibromatosis type 1
 - d) Wilson's disease
 - e) Neurofibromatosis type 2

Question 10

- A 26-year-old man is diagnosed with schizophrenia.
- Which one of the following predicts a poor prognosis?
 - a) Absence of negative symptoms
 - b) Being married
 - c) Few or no previous episodes
 - d) Good social support
 - e) Gradual onset

Answers 6-10

- Answers

Question 6

- Which of these symptoms are not measured in the Simpson-Angus Extrapyramidal side effects scale
 - a) Hypersalivation
 - b) Arm drop
 - c) **Bradykinesia**
 - d) Head drop
 - e) Glabella tap

SA scale measures - gait, elbow drop, wrist rigidity, tremor, salivation, glabella tap, head dropping, arm dropping, leg pendulousness

Question 7

eliminate
options

- A 23-year-old man reported being able to smell music after taking a cocktail of illicit drugs.
- a) **Synaesthesia**
- b) Functional hallucination
- c) Delusional perception
- d) Command hallucination
- e) Autoscopy

Synaesthesia – joining of senses that are not usually connected

Autoscopy – perceiving the surrounding the environment from a different perspective

Question 8

Think of
clinical
practice

- Which of the following is true regarding lithium's effect on the white cell count?
 - a) Lithium should be avoided in patients on chemotherapy
 - b) It causes an acute reduction in the neutrophil count
 - c) The effect is dose related
 - d) **Neutrophil levels are increased**
 - e) Lithium must be avoided in patients prescribed clozapine

Lithium is sometimes prescribed with chemotherapy and clozapine to boost the WBC.

Effect is not dose related.

Question 9

Think of
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- Which of the following follows an X-linked dominant inheritance pattern?
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Hunter's, Duchenne muscular dystrophy, colour blindness – X-linked recessive – largely men who have it

Vitamin D resistant rickets, Alport, Fragile X – X linked dominant – men and women have it

NF type 1& 2 – Autosomal dominant

Wilson's disease – Autosomal recessive

Question 10

Eliminate
answers

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Questions 11- 15

- Questions

Question 11

- A 35-year-old female has been diagnosed with moderate depression with sleep problems.
- The psychiatrist decides to start her on mirtazapine as it would also help her with the sleep.
- Which of the following is responsible for mirtazapine's action as an hypnotic?
 - a) H₁ receptor blocking
 - b) 5HT_{1A} blocking
 - c) 5HT_{2C} blocking
 - d) 5HT_{2A} blocking
 - e) 5HT₃ blocking

Question 12

- A 23 year old patient with Schizophrenia has been prescribed Asenapine. She has noticed an improvement in her negative symptoms.
- Asenapine exerts its anti-depressant actions via the following receptors
 - a) D2 receptor
 - b) M2 receptor
 - c) 5HT_{2c} receptor
 - d) H₁ receptor
 - e) 5HT_{2A} receptor

Question 13

- Erikson maintained that personality develops in a predetermined order through eight stages of psychological development. Which Erikson's psychological crisis stage is linked to the Freudian 'Oral' psycho-sexual stage of development
- Trust vs Mistrust
- Intimacy vs Isolation
- Initiative vs Guilt
- Identity vs Role confusion
- Industry vs Inferiority

Question 14

- Which of the following behavioural treatments is paired to the incorrect founder
 - a) Token Economy – Wolpe
 - b) Habituation – Thompson and Spencer
 - c) Chaining – Skinner
 - d) Shaping – Skinner
 - e) Reciprocal disinhibition - Wolpe

Question 15

- A patient presents to you with low mood. He has a previous history of depression and has responded to treatment. He does not have a history of BPAD. You wish to commence antidepressants and monitor his response to treatment.
- Which of the following scales would be inappropriate to use
 - a) Becks Depression Inventory
 - b) Zung Self-Rating depression scale
 - c) PHQ-9
 - d) Weinberg Screen Affective Scale
 - e) Mood Disorder Questionnaire

Answers Question 11-15

-

- Answers

Question 11

Odd one out

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 - e) 5HT₃ blocking

Question 12

Think basics

- A 23 year old patient with Schizophrenia has been prescribed Asenapine. She has noticed an improvement in her negative symptoms.
- Asenapine exerts its anti-depressant actions via the following receptors
 - a) D2 receptor
 - b) M2 receptor
 - c) **5HT_{2c} receptor**
 - d) H₁ receptor
 - e) 5HT_{2A} receptor

Its main anti-psychotic actions are due to D₂ and HT_{2A} antagonism. It has a very poor affinity to M receptors. It's sedative effects are due to the H₁ affinity.

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Think basics

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 - a) **Token economy– Wolpe**
 - b) Habituation – Thompson and Spencer
 - c) Chaining – Skinner
 - d) Shaping – Skinner
 - e) Reciprocal disinhibition - Wolpe

Wolpe introduced most learning theories linked to Classical conditioning.
E.g Reciprocal disinhibition, Systematic desensitisation, Flooding

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Odd one out

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 - b) Zung Self-Rating depression scale
 - c) PHQ-9
 - d) Weinberg Screen Affective Scale
 - e) **Mood Disorder Questionnaire**

Mood Disorder Questionnaire is used to detect BPAD

Questions 16- 20

- Questions

Question 16

- Information processing theory was developed over many years and multiple stages. Which theorist explained that information is stored in different areas of the brain and connected as a network
 - a) Bransford
 - b) Atkinson
 - c) Rumelhart and McClelland
 - d) Miller
 - e) Craik and Lockhart

Question 17

- Memory is categorised into subcomponents. Which of the following is paired correctly
 - a) Jennifer recalls feeling very happy at her graduation. She recalls seeing her parents in the audience – Procedural memory
 - b) Matt is the perfect friend for a Pub quiz. He knows the capitals of most countries – Semantic memory
 - c) Nancy can use the TV remote with her eyes closed – Episodic memory
 - d) Mary remembers her daughters' first day at school and describes this to her grand children – Procedural memory
 - e) David has started cycling to work. He last rode a bicycle 2 years ago – Semantic memory

Question 18

- Papez circuit involves various structures of the brain. It goes through the following structures apart from
 - a) Hippocampus
 - b) Mammillary bodies
 - c) Fornix
 - d) Ventral anterior nucleus
 - e) Cingulum

Question 19

- Which is the Vygotsky stage of development in Early childhood (2-7 years)
 - a) Sensorimotor
 - b) Play
 - c) Oedipal
 - d) Preoperational
 - e) Learning

Question 20

- What is a common neuro imaging finding in Huntington's disease
 - a) Caudate head atrophy resulting in enlargement of the frontal horns on MRI
 - b) Medial Temporal Lobe atrophy on MRI
 - c) Atrophy of the midbrain with a preserved Pons on MRI
 - d) Hyperintense signal involving the pulvinar and dorsomedial thalamic nuclei bilaterally on FLAIR
 - e) occipital hypometabolism with relative sparing of the Posterior cingulate cortex on PET

Answers 16-20

- Answers

Question 16

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 - b) Atkinson
 - c) **Rumelhart and McClelland**
 - d) Miller
 - e) Craik and Lockhart

This is also called connectionist model and is supported by current neuroscience research.

Craik and Lockhart – levels of processing theory

Bransford – information retrieval

Atkinson and Shrifin – three-stage information processing model

Miller – related to high speed computers – input- output

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Types of LTM – Episodic, semantic and procedural

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 - b) Mammillary bodies
 - c) Fornix
 - d) **Ventral anterior nucleus**
 - e) Cingulum

Ventral Anterior Nucleus is a nucleus of the thalamus.

Papez circuit begins and ends at the Hippocampus. It is central to emotion. It goes through the hippocampal formation, fornix, mammillary bodies, mammillothalamic tract, anterior thalamic nucleus, cingulum and entorhinal cortex

Question 19

- Which is the Vygotsky stage of development in Early childhood (2-7 years)
 - a) Sensorimotor
 - b) **Play**
 - c) Oedipal
 - d) Preoperational
 - e) Learning

Piaget, Vygotsky and Freud are the main contributors for theories of development. Vygotsky described Play in early childhood and Learning in Middle childhood.

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MTL atrophy – AD, Hummingbird sign – PSP, Hockeystick sign – CJD,
Cingulate island sign - LBD

Thank you