

MBBS
2008

Aga Khan University
Medical College
Admission Test
Information for Applicants

Admission Test Centre

- Date and venue of the Test has been indicated in the brochure/prospectus and on the admit card.
- Applicants should indicate one Centre of their choice in the space provided in the application form.
- In case the admit card does not reach on time, applicant is advised to write the Test at a convenient Centre with a photocopy of the application form for identification.
- Applicants should note that the Admission Test will be administered at a Centre only if there are sufficient candidates.

Test Structure

- The duration of the Test is 2 hours.
- All questions are compulsory.
- The test paper comprises the following sections:

Biology	:	Multiple choice questions	30
Chemistry	:	Multiple choice questions	30
Physics	:	Multiple choice questions	30
Mathematics	:	Multiple choice questions	20
English	:	Multiple choice questions	40

150

- *The University has not authorised any publication or preparatory classes for this Test.*
- Applicants are advised not to guess answers. Each correct answer in the biology, chemistry and physics section receives one point. Omitted questions do not get any point. One-fourth of a point is subtracted for incorrect responses. For Mathematics each correct answer receives point 0.5; one fourth of a point is subtracted for two incorrect responses. There is no negative marking in the English section.

The Answer Sheet

- The Test will be answered on a single, printed answer sheet. This answer sheet is scored by a computer.
- All answers must be marked in pencil.
- The answer sheet is extremely sensitive. Be absolutely sure before marking an answer; make a dark mark. If you wish to change the answer, erase completely and then make a new mark. If the computer reads two marks, it will record a zero.

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Specimen Paper

Biology

Q.1. A membrane network of channels which transports materials in a cell is called:

- A. Mitochondria
- B. Lysosomes
- C. Endoplasmic reticulum
- D. Chromatin reticulum

Q.2. Insects resist desiccation because of:

- A. The nature of their cuticle
- B. Their small size
- C. Tracheal method of breathing
- D. Their excretion of urea

Q.3. In the black, bread mold, the hyphae that absorb nutrients and penetrate the bread are known as :

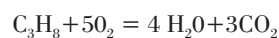
- A. Sporangiohores
- B. Stolons
- C. Rhizoids
- D. Gametangia

Q.4. Measles, smallpox and influenza are all diseases caused by:

- A. Fungi
- B. Protozoa
- C. Viruses
- D. Bacteria

Chemistry

Q.5. What volume of carbon dioxide would be produced if 5 liters of propane, C_3H_8 were burnt in air according to the following equation:



- A. One liter
- B. Three liters
- C. Fifteen liters
- D. Thirty liters

Q.6. Which of the following when added to pure water, will increase its pH:

- A. NH_3
- B. HI
- C. HBr
- D. CH_4

Q.7. The empirical formula of a liquid compound is $C_6H_{12}O_6$. To find molecular formula, it is necessary to know the :

- A. Boiling point of the compound
- B. Density of the compound
- C. Relative molecular mass of the compound
- D. Percentage composition of the compound

Q.8. Isotopes have the same :

- A. Electron structure
- B. Mass number
- C. Number of neutrons
- D. Physical properties

Physics

Q.9. Which of the following wave is not an example of a transverse wave :

- A. Radio waves
- B. Sound waves
- C. X-rays
- D. Waves in the sea

Q.10. Which of the following principle is true for electromagnetism :

- A. A wire carrying a current produces a magnetic field.
- B. A wire moving in a magnetic field has an EMF induced in it.
- C. A wire carrying a magnetic field, experiences a force.
- D. A changing magnetic field through a coil produces an induced EMF in the coil.

Q.11. Heating a magnet will :

- A. Weaken its magnetic field
- B. Strengthen its magnetic field
- C. Reverse its polarity
- D. Have no effect

Q.12. What is the magnitude of the acceleration for the object shown below?



- A. 2.5 m/s^2
- B. 3.0 m/s^2
- C. 9.8 m/s^2
- D. 12 m/s^2

Mathematics

Q.13. If two similar triangles have bases in the ratio of 2:3, what is the ratio of their areas :

- A. 1:1
- B. 2:3
- C. 4:6
- D. 4:9

Q.14. In a group of 80 children, there are 22 more girls than boys. How many girls are there in the group :

- A. 36
- B. 44
- C. 48
- D. 51

Q.15. If $pqr=0$, $prs=0$, and $rst=1$, which of the following must equal 0 :

- A. p
- B. q
- C. r
- D. s

Q.16. Which would result in the largest number:

- A. $10^2 + 30^2$
- B. 10^4
- C. $(19 \times 21) + (29 \times 31)$
- D. 25×36

English

I Read the following passage and answer the questions below:

Dropping Cholesterol

1 Reducing cholesterol has become the mantra of doctors and patients alike. Over the last decade clinical trials have shown that a drop in cholesterol levels slows the growth of arterial blockages and
5 reduces heart attacks among patients with a high risk of heart diseases. But orchestrating that drop with drugs has been controversial; several studies suggested that such drugs increase the risk of death from cancer and suicide, even as they lower
10 the death rate from heart attacks.

Now a study by a team of Scandinavian researchers shows that a member of a new class of cholesterol lowering drugs has the benefits without the drawbacks. The treatment reduces the number of
15 fatal heart attacks by more than 40% without raising the death rate due to other factors.

Q.17. Why has the use of drugs to control cholesterol level been controversial'?

- A. The drugs are linked to increased risk of death from other factors.
- B. The growth of arterial blockages slows down as these drugs reduce cholesterol level.
- C. Patients face a high risk heart disease as a side effect of these drugs.
- D. The death rate from heart attacks remains unchanged.

Q.18. Patients with a high risk of heart disease would benefit.

- A. From the use of controversial drugs.
- B. From a number of new drugs with some draw backs.
- C. If their cholesterol level dropped.
- D. If orchestras were less controversial.

Q.19. Use the given text in (I) to select the most appropriate choice in meaning for the word "orchestrating" in line 6.

- A. Changing
- B. Arranging something in order
- C. Re-Arranging something
- D. Putting aside

II Select the answer (A, B, C, or D) that completes the following sentence most appropriately.

Q.20. If I _____ enough money, I would go around the world.

- A. had
- B. have
- C. has
- D. could

Q.21. The boy explained the reason for coming late _____ detail.

- A. for
- B. with
- C. in
- D. by

