



# MSAT–Malaysia

Medical School Admissions Test – Malaysia

Sample Questions



The questions in this short booklet are provided to give you a general idea of the style and difficulty of the MSAT-Malaysia test before you register to sit. When you register you will be provided with the extended version of this booklet as part of your registration.

If you wish to practice more questions you can purchase a second sample questions booklet from the ACER MSAT-Malaysia website.



## UNIT 1: SOLAR SYSTEM

### Questions 1 – 4

Our solar system is composed of nine\* planets that travel around a star we call the Sun. Figure 1 indicates the relative sizes of the planets and their order from the Sun. Table 1 provides further information about the planets (based on information known around the year 2000).

- An orbit is the path a planet takes as it travels completely around the Sun.
- The length of a year for a planet is the time it takes for the planet to travel once around the Sun.
- The length of a day for a planet is the time it takes to spin around once on its axis.

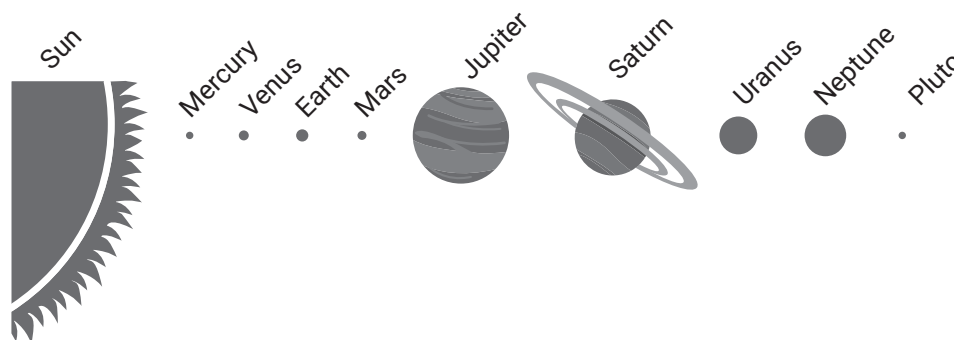


Figure 1

Table 1

Planet	Mean distance from the Sun ( $\times 1,000,000$ km)	Diameter (km)	Number of moons	Average orbital speed (km/s)	Time to orbit the Sun (Earth years)	Length of day (hours)
Mercury	58	4,880	0	48.0	0.24	1416
Venus	108	12,100	0	35.0	0.62	5832
Earth	150	12,760	1	30.0	1.00	24
Mars	228	6,800	2	24.0	1.88	24.6
Jupiter	778	143,800	16	13.0	11.86	9.84
Saturn	1,427	120,000	18	10.0	29.46	10.23
Uranus	2,870	52,300	15	6.8	84.01	17.24
Neptune	4,497	49,500	8	5.4	164.79	18.4
Pluto	5,900	3,000	1	4.7	247.70	153.4

\* recently Pluto has been downgraded to a minor planet.

**1** Which one of the following statements is supported by the data?

- A** Day length increases as distance from the sun decreases.
- B** Orbital speed increases as year length decreases.
- C** Diameter increases as orbital speed increases.
- D** Year length decreases as diameter increases.

**2** Which of the following statements is best supported by the data?

- A** Planets further from the sun travel faster and therefore have shorter days.
- B** Planets closer to the sun travel faster and therefore have shorter days.
- C** Planets with longer days travel slower and are closer to the sun.
- D** Day length is unrelated to average orbital speed and distance from the sun.

**3** Which of the following is the best estimate of the number of Neptune days that equal ten Earth days?

- A** 4
- B** 8
- C** 12
- D** 16

**4** Which of the following is the best estimate of the number of Saturn days in an Earth year?

- A** 1600
- B** 800
- C** 400
- D** 100

## UNIT 4: TEXT

### Questions 1 – 3

The following passage describes the experiences of a man who has had surgery that has given him vision after a lifetime of blindness.

One man when shown an orange a week after beginning to see, said that it was gold. When asked, 'What shape is it?' he said, 'Let me touch it and I will tell you!' After doing so, he said that it was an orange. Then he looked long at it and said, 'Yes, I can see that it is round.' Shown next a blue square, he said it was blue and round. A triangle he also described as round. When the angles were pointed out to him he said, 'Ah. Yes, I understand now, one can see how they feel.' For many weeks and months after beginning to see, the person can only with great difficulty distinguish between the simplest shapes, such as a triangle and a square. If you ask him how he does it, he may say, 'Of course if I look carefully I see that there are three sharp turns at the edge of one patch of light, and four on the other.' But he may add peevishly<sup>1</sup>, 'What on earth do you mean by saying that it would be useful to know this? The difference is only very slight and it takes me a long time to work it out. I can do much better with my fingers.' And if you show him the two shapes the next day he will be quite unable to say which is a triangle and a square.

<sup>1</sup> impatiently or irritably

- 1** One week after beginning to see, the man
- A** related shapes directly to visual images.
  - B** formed visual impressions of shapes indirectly.
  - C** recognised shapes by associating them with colour.
  - D** no longer relied on his sense of touch to recognise shapes.
- 2** The man's mistake about the square (lines 6–7) suggests that
- A** his vision was still impaired.
  - B** he could not make full use of visual clues.
  - C** the idea of shape was meaningless for him.
  - D** colour made shape perception more difficult.
- 3** The passage suggests that shape perception is generally dependent on
- A** experience.
  - B** clear vision.
  - C** natural ability.
  - D** colour perception.

# Interpersonal Understanding

## UNIT 9

### Questions 1 – 4

The following passage is from a novel. Paul is a sixty-year-old man whom has had a leg amputated as the result of being hit by a car while riding a bicycle. A prosthesis is an artificial limb.

'Today we're going to have you walking,' says young Dr Hansen. 'This afternoon. Not a long walk, just a few steps to give you the feel of it. Elaine and I will be there to lend you a hand.' He nods to the nurse. Nurse Elaine. 'Elaine, can you set it up with Orthopaedics?'

'I don't want to walk today,' Paul says. He is learning to talk through clenched teeth. It is not just that the jaw is bruised, the molars on that side have been loosened too, he cannot chew. 'I don't want to be rushed. *I don't want a prosthesis.*' 5

'That's fine,' says Dr Hansen. 'It's not a prosthesis we are talking about anyway, that is still down the line, this is just rehabilitation. But we can start tomorrow or the next day. Just so you can see it isn't the end of the world, losing a leg.'

'Let me say it again: *I don't want a prosthesis.*' 10

Dr Hansen and Nurse Elaine exchange glances.

'If you don't want a prosthesis, what would you prefer?'

'I would prefer to take care of myself.'

'All right, end of subject, we won't rush you into anything, I promise. Now can I talk to you about your leg? Can I tell you about care of the leg?' 15

*Care of my leg?* He is smouldering with anger – can they not see it? *You anaesthetised me and hacked off my leg and dropped it in the refuse for someone to collect and toss into the fire. How can you stand there talking about care of my leg?*

'We have brought the remaining muscle over the end of the bone,' Dr Hansen is saying, demonstrating with cupped hands how they did it, 'and sewn it there. Once the wound heals we want that muscle to form a pad over the bone. During the next few days, from the trauma and from the bed rest, there will be a tendency to oedema and swelling. We need to do something about that. There will be a tendency for the muscle to retract towards the hip, like this.' He stands sideways, pokes out his behind. 'We counteract this by stretching. Stretching is very important. Elaine will show you some stretching exercises and help you if you need help.' 20

Nurse Elaine nods.

'Who did this to me?' Paul says. He cannot shout because he cannot open his jaws, but that suits him, suits his teeth-grinding rage. 'Who hit me?' There are tears in his eyes. 25

**1** In context, Dr Hansen's assertion that losing a leg 'isn't the end of the world' (line 9)

- A** A shows impatience.
- B** B is an attempt to encourage optimism.
- C** C shows that he thinks Paul is being self-indulgent.
- D** D is meant to conceal the hopelessness of Paul's situation.

**2** In lines 19–25 Dr Hansen seems to understand Paul's treatment principally as

- A** A offering the patient comfort.
- B** B motivating a lethargic patient.
- C** C carrying out a mechanical repair.
- D** D overcoming the patient's stupidity.

**3** When Dr Hansen and Nurse Elaine 'exchange glances' (line 11) it shows that they

- A** A disagree about how to handle this situation.
- B** B have a shared understanding of this situation.
- C** C are experiencing this situation for the first time.
- D** D are embarrassed by the situation they have created.

**4** By the end of the passage Paul's rage has been

- A** dispelled.
- B** trivialised.
- C** contained.
- D** redirected.

## ANSWERS

Quantitative Reasoning		Critical Reasoning		Interpersonal Understanding	
1	B	1	B	1	B
2	D	2	B	2	C
3	C	3	A	3	B
4	B			4	D

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