IELTS

Overview

IELTS Academic Reading Test

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IELTS Academic Reading

Total Marks – 40

Total Time Limit (In minutes) – 60

IELTS Academic Reading Sample Tasks

The IELTS Academic Reading test includes a variety of tasks. The task types are: multiple-choice questions, identifying information, identifying the writer's views/claims, matching information, matching headings, matching features, matching sentence endings, sentence completion, summary completion, note completion, table completion, flow-chart completion, diagram label completion and short-answer questions.

Contents

Academic Reading Sample Task – Matching Features

[Note: This is an extract from an Academic Reading passage on the development of rockets. The text preceding this extract explored the slow development of the rocket and explained the principle of propulsion.]

The invention of rockets is linked inextricably with the invention of 'black powder'. Most historians of technology credit the Chinese with its discovery. They base their belief on studies of Chinese writings or on the notebooks of early Europeans who settled in or made long visits to China to study its history and civilisation. It is probable that, sometime in the tenth century, black powder was first compounded from its basic ingredients of saltpetre, charcoal and sulphur. But this does not mean that it was immediately used to propel rockets. By the thirteenth century, powder-propelled fire arrows had become rather common. The Chinese relied on this type of technological development to produce incendiary projectiles of many sorts, explosive grenades and possibly cannons to repel their enemies. One such weapon was the 'basket of fire' or, as directly translated from Chinese, the 'arrows like flying leopards'. The 0.7-metre-long arrows, each with a long tube of gunpowder attached near the point of each arrow, could be fired from a long, octagonal-shaped basket at the same time and had a range of 400 paces. Another weapon was the 'arrow as a flying sabre', which could be fired from crossbows. The rocket, placed in a similar position to other rocket-propelled arrows, was designed to increase the range. A small iron weight was attached to the 1.5m bamboo shaft, just below the feathers, to increase the arrow's stability by moving the centre of gravity to a position below the rocket. At a similar time, the Arabs had developed the 'egg which moves and burns'. This 'egg' was apparently full of gunpowder and stabilised by a 1.5m tail. It was fired using two rockets attached to either side of this tail.

It was not until the eighteenth century that Europe became seriously interested in the possibilities of using the rocket itself as a weapon of war and not just to propel other weapons. Prior to this, rockets were used only in pyrotechnic displays. The incentive for the more aggressive use of rockets came not from within the European continent but from far-away India, whose leaders had built up a corps of rocketeers and used rockets successfully against the British in the late eighteenth century. The Indian rockets used against the British were described by a British Captain serving in India as 'an iron envelope about 200 millimetres long and 40 millimetres in diameter with sharp points at the top and a 3m-long bamboo guiding stick'. In the early nineteenth century the British began to experiment with incendiary barrage rockets. The British rocket differed from the Indian version in that it was completely encased in a stout, iron cylinder, terminating in a conical head, measuring one metre in diameter and having a stick almost five metres long and constructed in such a way that it could be firmly attached to the body of the rocket. The Americans developed a rocket, complete with its own launcher, to use against the Mexicans in the mid-nineteenth century. A long cylindrical tube was propped up by two sticks and fastened to the top of the launcher, thereby allowing the rockets to be inserted and lit from the other end. However, the results were sometimes not that impressive as the behaviour of the rockets in flight was less than predictable.

Questions 1 – 4

Look at the following items (Questions 7-10) and the list of groups below.

Match each item with the group which first invented or used them.

Write the correct letter A-E in boxes 7-10 on your answer sheet.

NB You may use any letter more than once.

1 black powder

2 rocket-propelled arrows for fighting

3 rockets as war weapons

4 the rocket launcher

First invented or used by

A - the Chinese

B- the Indians

C - the British

D- the Arabs

E- the Americans

Academic Reading Sample Task - Table Completion

[Note: This is an extract from an Academic Reading passage on the subject of dung beetles. The text preceding this extract gave some background facts about dung beetles, and went on to describe a decision to introduce non-native varieties to Australia.]

Introducing dung1 beetles into a pasture is a simple process: approximately 1,500 beetles are released, a handful at a time, into fresh cow pats2 in the cow pasture. The beetles immediately disappear beneath the pats digging and tunnelling and, if they successfully adapt to their new environment, soon become a permanent, self-sustaining part of the local ecology. In time they multiply and within three or four years the benefits to the pasture are obvious.

Dung beetles work from the inside of the pat so they are sheltered from predators such as birds and foxes. Most species burrow into the soil and bury dung in tunnels directly underneath the pats, which are hollowed out from within. Some large species originating from France excavate tunnels to a depth of approximately 30 cm below the dung pat.

These beetles make sausage-shaped brood chambers along the tunnels. The shallowest tunnels belong to a much smaller Spanish species that buries dung in chambers that hang like fruit from the branches of a pear tree. South African beetles dig narrow tunnels of approximately 20 cm below the surface of the pat. Some surface-dwelling beetles, including a South African species, cut perfectly-shaped balls from the pat, which are rolled away and attached to the bases of plants.

For maximum dung burial in spring, summer and autumn, farmers require a variety of species with overlapping periods of activity. In the cooler environments of the state of Victoria, the large French species (2.5 cms long), is matched with smaller (half this size), temperate-climate Spanish species. The former are slow to recover from the winter cold and produce only one or two generations of offspring from late spring until autumn. The latter, which multiply rapidly in early spring, produce two to five generations annually. The South African ball-rolling species, being a sub-tropical beetle, prefers the climate of northern and coastal New South Wales where it commonly works with the South African tunneling species. In warmer climates, many species are active for longer periods of the year.

Glossary

1. dung: the droppings or excreta of animals
2. cow pats: droppings of cows

Question 5 – 9

Complete the table below.

Choose **NO MORE THAN THREE WORDS** from the passage for each answer.

Write your answers in boxes 5-9 on your answer sheet.

Species	Size	Preferred climate	Complementary species	Start of active period	Number of generations per year
French	2.5 cm	Cool	Spanish	late spring	1 - 2
Spanish	1.25 cm	5....		6....	7....
South African ball roller	8....	9....			

Alternative answers are separated by a slash (/).

Academic Reading Sample Task – Flow-chart Completion: selecting words from the text

[Note: This is an extract from a Part 3 text about the effect of a low-calorie diet on the aging process.]

No treatment on the market today has been proved to slow human aging. But one intervention, consumption of a low-calorie* yet nutritionally balanced diet, works incredibly well in a broad range of animals, increasing longevity and prolonging good health. Those findings suggest that caloric restriction could delay aging and increase longevity in humans, too. But what if someone could create a pill that mimicked the physiological effects of eating less without actually forcing people to eat less, a 'caloric-restriction mimetic'?

The best-studied candidate for a caloric-restriction mimetic, 2DG (2-deoxy-D-glucose), works by interfering with the way cells process glucose. It has proved toxic at some doses in animals and so cannot be used in humans. But it has demonstrated that chemicals can replicate the effects of caloric restriction; the trick is finding the right one.

Cells use the glucose from food to generate ATP (adenosine triphosphate), the molecule that powers many activities in the body. By limiting food intake, caloric restriction minimizes the amount of glucose entering cells and decreases ATP generation. When 2DG is administered to animals that eat normally, glucose reaches cells in abundance but the drug prevents most of it from being processed and thus reduces ATP synthesis. Researchers have proposed several explanations for why interruption of glucose processing and ATP production might retard aging. One possibility relates to the ATP-making machinery's emission of free radicals, which are thought to contribute to aging and to such age-related diseases as cancer by damaging cells. Reduced operation of the machinery should limit their production and thereby constrain the damage. Another hypothesis suggests that decreased processing of glucose could indicate to cells that food is scarce (even if it isn't) and induce them to shift into an anti-aging mode that emphasizes preservation of the organism over such 'luxuries' as growth and reproduction.

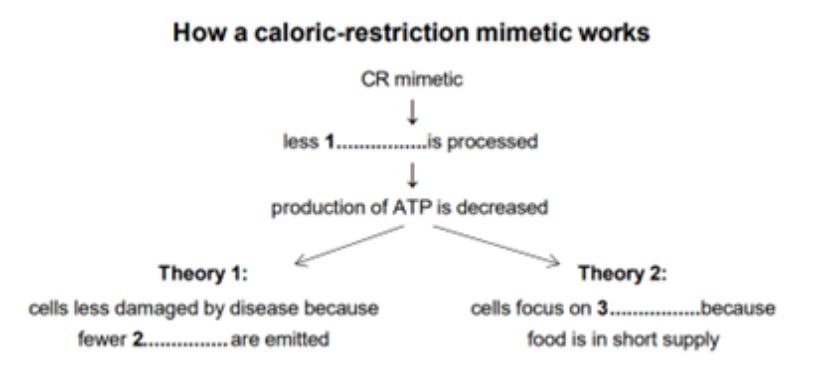
*calorie: a measure of the energy value of food

Questions 10 – 12

Complete the flow-chart below.

Choose NO MORE THAN TWO WORDS from the passage for each answer.

Write your answers in boxes 10-12 on your answer sheet.



Academic Reading Sample Task – Matching Features (Answers)

1. C - He’s my brother.
2. A - Yes, please.
3. A - So do I.
4. B - I love it.
5. E - It’s Tuesday.

Academic Reading Sample Task – Table Completion (Answers)

5 temperate

6 early spring

7 two to five / 2-5

8 sub-tropical

9 South African tunneling/tunnelling

Academic Reading Sample Task – Flow-chart Completion: selecting words from the text (Answers)

10. glucose

11. free radicals

12. preservation