IELTS Practice Test Volume 2

Reading Practice Test 2

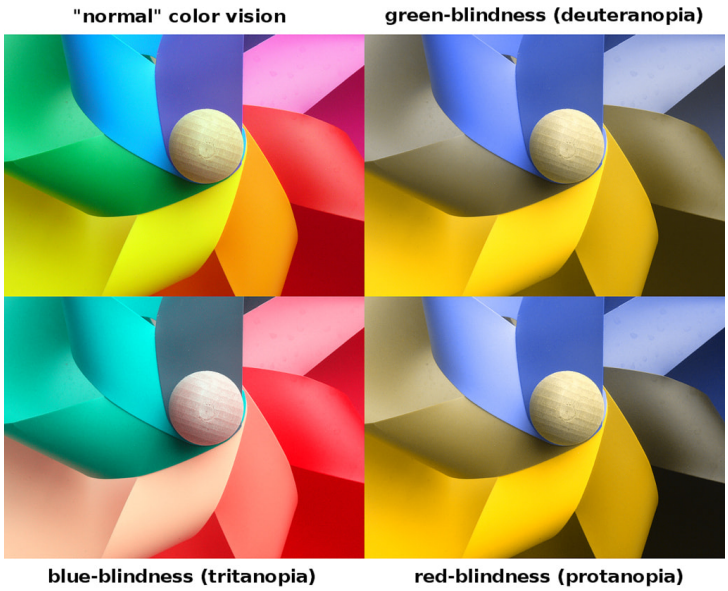
HOW TO USE

You have 2 ways to access the test

1. Open this URL **https://link.intergreat.com/hsFDN** on your computer
2. Use your mobile device to scan the QR code attached

Reading Passage 1

You should spend about 20 minutes on ***Questions 1-13****, which are based on Reading Passage One.*



The Search for Colour

We seldom reflect on the artificial colour of modern merchandise. A blue car is blue; a red chair, red; a green bicycle, green. But why does it have colour? Answer, because its surface contains pigment. If this was originally dissolved in a carrier liquid to transfer the colour, it is known as a dye, but whatever the case, since colour is the most visible element in all objects we desire, pigments can be said to be the basis of customer choice, and therefore of almost all hard trade and transactions. Consequently, production of this substance is big business, now accounting for over twenty billion dollars annually in global sales—yet there was a time when none of it existed.

Going back into the mists of prehistory, objects, tools, and clothing were all earthen and bland, without anything except their natural colours. The first pigments used were of mineral origin — from natural clays tinted by the presence of iron-oxides. The best known examples are the gold colour of ochre, the brown of umber, and the yellow of sienna. These were ground up and mixed with fat to create paint, used, for example, in the earliest European cave paintings. Ash, as well as charcoal (derived from heating wood in the absence of oxygen), were also used to provide black, but in the search for colour, it was soon discovered that biological matter, such as plants, animal waste, mollusks, and insects, could yield more interesting results.

Crimson —a bright red colour—is a good example. It was extracted from kermes, a small insect found on Southern-European oak trees. The pigment is a constituent of the carminic acid produced inside the creature's body, used to discourage predation by birds or other insects. However, with the trees being large and bushy, and the sap-feeding insects few and far

between, pigment production was a meticulous and time-consuming process. This increased the price of the product, the end result being that, in Northern Europe, pure crimson long remained a luxury colour for clothing and textiles.

Interestingly, across the Pacific Ocean, people were producing the same colour from the same chemical within another insect. They were called cochineals: small scaly creatures which breed in abundant clusters on the fleshy leaves of a commonly occurring cactus. These insects have many advantages over kermes. Being so prolific and so easily seen by predators, they need to produce higher concentrations of carminic acid for protection, up to a quarter of their body weight. The pigment which results is also stronger and longer-lasting. Finally, the insects are far more easily obtained, being simply scrapped or knocked off the cactus leaves, Thus, after the Spanish conquest of Mexico, cochineals replaced kermes almost completely, becoming a lucrative Central American export for the next few centuries.

The lure of crimson was only exceeded by the vivid 'Tyrian purple' — a colour which had ranked in highest favour since antiquity. Its source was the medium-sized Murex sea snail. With a range around the coastal Mediterranean, early civilisations there soon realised that the mucus the snail secretes when poked and prodded could be treated to produce a purplish-blue dye which did not fade with time. However, by needing thousands of sea snails and using a complicated (and still little known) process, all for the production of only small amounts of pigment, the colour was so expensive it could only be afforded by the ruling classes. This led to purple becoming associated with royalty. Roman emperors traditionally wore clothing of this colour.

For a less durable blue, suitable for dyeing clothes, the indigo plant was discovered. Its leaves were fermented, and then left to age, and the sediment eventually produced was dried, treated, then reduced to a blue powder. This pigment can, in fact, be said to be the oldest used to colour fabric. It is one reason jeans were originally blue, and remain so to this day, indigo being the dye used to colour them. However, it was not suitable for painting or artistic purposes. For that, European artists used a mixture derived from the grinding up of lapis lazuli, a semi-precious stone, whose only known source was in far Afghanistan. Consequently, this colour was very costly, and many artists avoided it altogether. Others, however, were deliberately extravagant in its use, producing proportionally more expensive paintings.

The cost of this paint resulted in much experimentation during the Industrial Revolution in search of chemical-based alternatives. This eventually led to the first modern synthetic pigment, Prussian Blue. Discovered in Germany in the early 18thcentury, it was put into rapid production and exportation, giving artists around the world the first cheap, yet stable, blue pigment. Other chemists were making similar breakthroughs. The vivid purple of the Murex snail was accidentally produced by an English chemist, William Perkins, who soon put 'mauveine' into commercial production. With such efforts, affordable pigments were soon found in all colours.

Mass production followed, bringing industrial prosperity to Northern Europe, but decline in many parts of the world where traditional organic pigments were still under production. In the Americas, for example, the crimson of cochineals, having long been a Spanish monopoly and rich source of export income, went into steady decline. However, all was not lost. In this modern age, there has been a shift back towards naturalness, even in pigments, and this has seen a resurgence in the popularity of cochineals. The pigment is now commercially produced in several countries, with Peru being the largest exporter.

Questions 1-4

Complete the sentences.

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

Ultimately, pigments are important because they are so 1 _____ .

Umber and sienna are examples of 2 _____

Originally, more unusual colours were derived from 3 _____

Generally, predators of insects do not like the taste of 4 _____

Questions 5-8

Do the following statements agree with the information given in Reading Passage One?

Write

TRUE	if the statement agrees with the information
FALSE	if the statement contradicts the information
NOT GIVEN	If there is no information on this

5 [ ] Kermes were easy to collect.

6 [ ] Kermes produce better pigment than cochineals.

7 [ ] Kermes are bigger than cochineals.

8 [ ] Cochineals are still a valuable crop.

Questions 9-13

Complete the summary of the second half of the passage.

Choose ONE WORD from the passage for each answer.

The best purple originally came from the 9 _____ of sea snails, although the oldest pigment for clothing was from the 10 _____ of indigo. The blue for picture-painting originated from a 11 _____ costing so much that an artificial replacement. Prussian Blue, was eventually produced, being not only inexpensive but also 12 _____ Ironically, the prized purple colour was discovered 13 _____

Reading Passage 2

You should spend about 20 minutes on ***Questions 14-26****, which are based on Reading Passage Two.*

The Most Dangerous Insect in the World

If asked to name the deadliest insect in the world, most people would search their minds for some sinister-looking spiders or scorpions, or exotic garden pests. However, if we define 'deadly' in terms of the number of people who die directly as a result of the insect, one of them leads the field, by far: the mosquito. As a blood-sucking pest, it transmits diseases to over 700 million people a year, killing a fair proportion of them in the process. No other insect comes even close to this.

Although all mosquitoes are nectar feeders, the females also need protein from a blood meal in order to produce eggs. To find this, they have a keen sense of smell, detecting the sweat and other organic compounds of mammals, such as the carbon dioxide they exhale. Scientific tests have proven that some people attract more mosquitoes than others, presumably having a better 'scent profile' — in fact, so adept are female mosquitoes at following these trails, they can infiltrate buildings through pipeways and air-conditioning ducts as they move inexorably towards their victims. Upon biting, they inject an anti-coagulating saliva into the flesh, and it is this fluid (and not their blood) which may contain the range of viral and parasitical nasties for which mosquitoes are notorious.

Yet even without such diseases, mosquitoes are an irritating nuisance which can occasionally cause serious injury. Upon being bitten, the body's immune system is activated, and subsequent bites trigger antibodies which cause inflammation and itching, particularly with young children. More bites can increase such sensitivity, resulting in pronounced swelling and blistering — wounds which can occasionally become infected, particularly when scratched. Two

famous victims of infected mosquito bites are Lord Carnarvon, the Egyptologist who played a role in the discovery of Tutankhamen's tomb, and the British poet, Rupert Brooke, passing away in Egypt and Greece, respectively.

But the real danger will always be mosquito-borne diseases. Dengue fever, West Nile virus, and several encephalitis-type diseases are all modern day killers. A less deadly but more insidious example is filariasis, a disease named from the thread-like parasites which migrate to the body's lymphatic system, causing parts of the body to permanently swell to grotesque proportions. Yet, as distressing as all this is, in terms of its death toll, the worst disease is undoubtedly malaria. Carried by the Anopheles mosquito, this parasite causes fever, shivering, joint pains, vomiting, and, if left untreated, a painful death. It infects over two million people a year, most of them children, killing over one quarter in the process.

The Aedes Aepypti mosquito is the species responsible for that other great killer: yellow fever. This is a viral disease, but limited to tropical areas, primarily in Africa, but also Central and South America. After high lever, nausea, and joint pains, the virus attacks the liver, causing the host's skin to turn yellow (hence the name), with death following some days later. Its toll is much smaller than malaria, with about 200,000 infections and 30,000 deaths every year, mostly in Africa. Unlike malaria, there exists a vaccine, and extensive vaccination programs sponsored by the WHO have had some success, whilst travelers to disease-prone areas are usually similarly protected.

With such a death toll, it took a surprisingly long time before the link between mosquitoes and disease was realised. This is exemplified in the construction of the Panama Canal — that ambitious project to excavate a passageway for ships through that narrow Central-American nation. In the 1880s, the French struggled for eight years in insect-infested jungle, but the death toll from malaria and yellow fever made it very difficult to maintain an experienced work force. After the loss of 22,000 lives, work was abandoned, yet shortly afterwards, a British doctor in India, Ronald Ross, deduced the means of disease transmission, identifying the malaria parasite in the gastrointestinal tract of mosquitoes. He also realised that mosquito numbers could be reduced by limiting their access to water, providing two crucial insights which laid the foundations for controlling the disease.

Thus, in 1904, when America resumed work on the Panama Canal, they instituted a multi-million dollar mosquito-abatement program, consisting of many strategies. Houses for workers were built with screens on the windows, buildings harbouring mosquitoes were fumigated, and sick workers were isolated behind nets. Stagnant pools of water (where mosquitoes breed) were sprayed with oil and insecticide, and roads were paved to eliminate puddles. For this same reason, swamps were drained, and proper piping was used for the transmission of drinking and waste water. All this reduced the number of deaths from disease over the ten-year construction phase to less than 6,000 — a considerable number, but still considered a major success.

To this day, reducing the incidence of stagnant pools of water, however small, remains very cost-effective in combatting mosquito-borne diseases in urban areas. Many of the most dangerous species breed in incidental ditches, flowerpots, or discarded containers into which rainwater has pooled. By eliminating such sites, the insects' numbers fall greatly, limiting bites to those mosquitoes which come from further afield, yet since they cannot travel far, the likelihood of being bitten (and infected) is greatly reduced.

Questions 14-18

Write TRUE, FALSE, or NOT GIVEN.

TRUE	if the statement agrees with the information
FALSE	if the statement contradicts the information
NOT GIVEN	If there is no information on this

14 [ ] Mosquito blood transmits disease.

15 [ ] Mosquitoes have good vision.

16 [ ] Rupert Brooke died in Greece.

17 [ ] Malaria kills over half a million people per year.

18 [ ] There is a vaccine for malaria.

Questions 19-22

Answer the questions.

Choose ONE WORD ONLY from the passage for each answer.

What can cause mosquito bites to become inflamed?

19 _____

Which disease causes the body to change shape?

20 _____

Which organ does yellow fever affect?

21 _____

In which parts of a country is removing exposed water a particularly cheap way to reduce mosquito numbers?

22 _____

Questions 23-26

Complete the summary.

*Choose **ONE WORD** from the passage for each answer.*

The Panama Canal

This large undertaking took place in 23 _____ full with insects. The number of workers was greatly reduced by disease, but after the malaria 24 _____ was discovered, all exposed water was removed or 25 _____ to deny breeding sites. The relatively low number of deaths which followed is attributed to these 26 _____

Reading Passage 3

You should spend about 20 minutes on ***Questions 27-40****, which are based on Reading Passage three.*

Waterfalls

Waterfalls are places where rivers or streams direct their flow over vertical drops. They have always been a lure for their scenic beauty or, in the case of the biggest, their ability to showcase nature's might and majesty. Niagara Falls, on the border of Canada and America (discharging the most water of all), is a magnet for visitors, as is Victoria Falls, also straddling an international boundary between Zimbabwe and Zambia, and presenting the single largest sheet of falling water in the world. Similarly, the remoteness and inaccessibility of the highest waterfall, Angel Falls, located deep in the middle of the Venezuelan jungle, has not stopped it from becoming one of the country's top tourist attractions.

There are many possible causes of waterfalls, but a common one is differences in rock type. When a river flows over a resistant rock bed, erosion is slow, but with the complex geological faulting of the Earth's surface, softer patches of rock can be exposed. The water cuts into this resulting in a minor turbulence at the boundary, stirring up pebbles and grit from the riverbed, which increases the erosive capacity of the current. And so a process begins whereby the river takes on two tiers, or levels, and a waterfall is born. Other more abrupt causes of waterfalls are earthquakes or landslides, which create fault lines in the land, or divert watercourses, respectively. Additionally, during past ice ages, glaciers scoured out many deep basins. These glaciers may have disappeared, but their feeder rivers can continue to flow as waterfalls into the remaining depressions.

Obviously then, waterfalls come in a variety of shapes and sizes, as different as the local geology in which they are found, and this has resulted in an abundance of descriptive terms. The word 'cataract' refers simply to a large powerful waterfall, while a 'cascade' descends a

series of rock steps. If these steps are very distinct, it is a ‘tiered waterfall’, and if each step is larger still, of approximately the same size, and with a significant pool of water at each base, it is known as a multi-step waterfall’. If the falling water engages with the rock face, it often widens, to be called a 'horsetail waterfall’, while if it does not touch the rock face at all, it is a ‘plunge waterfall’ — often the most picturesque.

Regardless of such differences, all waterfalls have in common a vertical height and average flow of water. These features, taken together, are a measure of the waterfall’s power, quantified using a ten-point logarithmic scale. Giant falls, such as Niagara, are graded at the very top of this scale, find smaller falls, which may occur in town creeks, at the bottom. Another common feature of larger falls is a ‘plunge pool’. This is caused by the rubble at the base of the falls, which is stirred and broken into smaller pieces. In the never-ending eddies and whirlpools, these pieces scour out a deep underwater basin. An interesting consequence is that such falls are in the process of retreat, since the softer material at the lower face suffers undercutting. This gives rise to rock shelters behind the falling water, which steadily become larger until the roof collapses, and the waterfall retreats significantly backward into the Earth.

Of course, to people at large, a waterfall seems fixed and forever. Erosion is indeed a slow process; however, given a sufficiently powerful waterfall and the right sort of rock, the retreat can be over a meter a year. This would be clearly observable over a person’s life time, and a fast-motion view, spanning several decades, would see an essentially unchanged height of falling water burrowing backwards with surprising evenness. Since this motion is towards higher elevations or through more hilly terrain, a host of geological features can be laid in the waterfall’s retreating path. Victoria Falls are a prime example, with its lower reaches characterised by spectacular islands, gorges, and rock formations.

This retreat occasionally causes problems, as can be seen with Niagara Falls. In just over ten millennia, the falls have moved almost 11 kilometres upstream. Since the Niagara river marks the border of Canada and America, as agreed in 1819, the detectable retreat of these falls since that time technically means that the Canadian frontier has advanced forward at the expense of America, although this argument has obviously caused dispute. More practically, with so much infrastructure, such as hotels, roads, bridges, and scenic viewpoints, all rigidly established, it remains important to limit the erosion. For this reason, the exposed ridges of the falls have been extensively strengthened, and underwater barriers installed to divert the more erosive of river currents.

The most ambitious erosion-control measure took place in 1969 on Niagara’s American Falls, whose retreat was nibbling away at American territory. The branch of the Niagara river which feeds these subsidiary falls was dammed, allowing the main Horseshoe Falls to absorb the excess flow. The then-completely-dry-and-exposed river bottom and cliff face allowed a team of US-army engineers to use bolts, cement, and brackets, to strengthen any unstable rock. Five months later, the temporary dam was destroyed with explosives, returning water to the falls,

but with the inexorable erosion process having been slowed considerably.

Questions 27-31

Write TRUE, FALSE, or NOT GIVEN.

TRUE	if the statement agrees with the information
FALSE	if the statement contradicts the information
NOT GIVEN	If there is no information on this

27 [ ] Niagara, Victoria, and Angel Falls are on international boundaries.

28 [ ] Landslides can create waterfalls faster than erosion.

29 [ ] Glaciers have produced the most waterfalls.

30 [ ] A tiered waterfall has the largest steps.

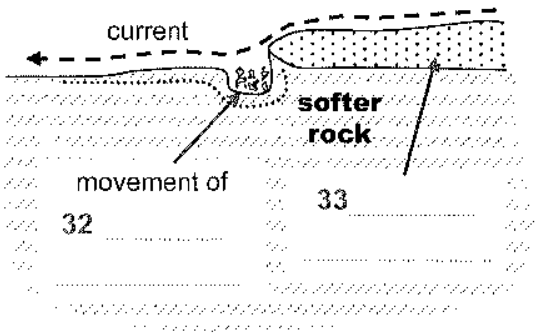
31 [ ] Niagara is a Grade Ten waterfall.

Questions 32-36

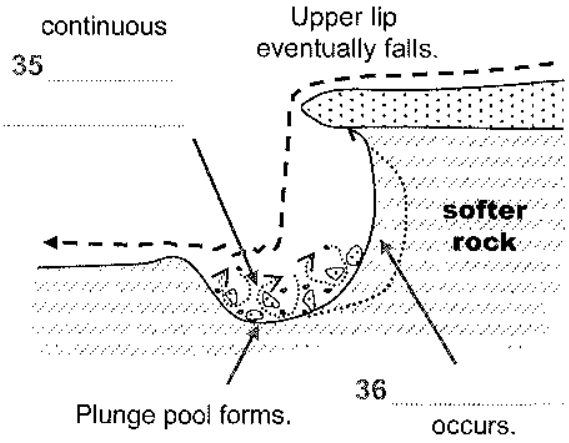
Complete the diagrams.

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

Common Formation of Waterfalls



34 ..... of Waterfalls



32 _____

33 _____

34 _____

35 _____

36 _____

Questions 37-40

Answer the questions.

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

What are gorges and rock formations examples of?

37 _____

Who has benefited from the erosion at Niagara Falls?

38 _____

What is used to control some of Niagara's water movements?

39 _____

On what geological parts of American Falls did the 1969 project focus?

40 _____

Solution:

Part 1: Question 1 - 13

1. visible
2. natural clays
3. biological matter
4. carminic acid
5. FALSE
6. FALSE
7. NOT GIVEN
8. TRUE
9. mucus
10. leaves
11. stone
12. stable
13. accidentally

Part 2: Question 14 - 26

14. TRUE
15. NOT GIVEN
16. TRUE
17. TRUE
18. FALSE
19. antibodies
20. filariasis
21. liver
22. urban
23. jungle

24 parasite

25 sprayed

26 strategies

Part 3: Question 27 - 40

27 FALSE

28 TRUE

29 NOT GIVEN

30 FALSE

31 TRUE

32 pebbles and grit

33 rock bed

34 Retreat

35 Eddies and whirlpools

36 Undercutting

37 geological features

38 Canada

39 underwater barriers

40 unstable rock