**[LinguaForum] b+ reading Actual Test**

**Passage 1 (p. 166)**

**Nez Percé**

**Mapping**

- is a Native American tribe that lived in the region that is currently the northwestern part of the US

- was a powerful tribe that inhabited parts of Idaho, Oregon, and Washington and one of several from the Plateau Culture area

-However, the Nez Percé War between the Wallowa band and the U.S brought these peaceful relationships to an end

- Starting from 1855, the Nez Percé had to give up their territories to the U.S and moved into smaller lands and reservations

-Finally, the Nez Percé refused to vacate the Wallowa Valley and move to Idaho under orders of the U.S. government

- Around 750 warriors of the Wallowa band dueled and fought over 2,000 U.S. troops; however, they had to surrender before the tribe could reach safety in Canada

- Today, around 4,000 descendants of them continue to exist and live in a reservation in Idaho and Washington

- Originally, the Nez Percé people led semi-sedentary lives; however, breeding horses enabled them to hunt animals and trade with other tribes

-They generally had peaceful relations with non-Native American peoples

- For example, after the Louisiana Purchase, Lewis and Clark were sent out to explore the western part of the U.S

-When they had arrived in western Idaho and ran low on food, the Nez Percé offered their expertise in navigating the wilderness, helped the group find food and even taught them how to build boats and directed them towards the Pacific Coast

-The Nez Percé developed good relations with foreigners over a long period of time

**F**

**Summary**

|  |
| --- |
| Nez Percé is a tribe that lived in the region that is currently the northwestern part of the United States.  Originally, the Nez Percé people led semi-sedentary lives; however, breeding horses enabled them to hunt animals and trade with other tribes. They generally had peaceful relations with non-Native American peoples as well.  For example, after the Louisiana Purchase, Lewis and Clark were sent out to explore the western part of the U.S.  When the expedition was running low on food in western Idaho, the Nez Percé helped them navigate the wilderness, find food and even taught them how to build boats and directed them towards the Pacific Coast.  However, the Nez Percé War between the Wallowa band and the U.S brought these peaceful relationships to an end. The Nez Percé had to give up their territories, but refused to vacate the Wallowa Valley and move to Idaho under orders of the U.S. government. The Wallowa band dueled and fought; however, they had to surrender before the tribe could reach safety in Canada. Today, around 4,000 descendants of them continue to exist and live in a reservation in Idaho and Washington. |

**[LinguaForum] b+ reading Actual Test**

**Passage 2 (p. 172)**

### Collecting Drinkable Water Out of Thin Air

**Mapping**

- In some parts of Africa, finding drinking water is an extremely difficult and time-consuming task

- Despite its high cost, water is not safe to drink because it is teeming with bacteria

- There has been other water saving inventions, such as a special toilet system that converts its water into drinkable water

-The conventional method of digging and installing wells is also still used

- Numerous philanthropists and non-profit organizations have donated to the water shortage cause

- However, some people suggest that the technology needed for them is too complex or that setup and maintenance costs are too expensive

-On the other hand, the Tower costs approximately $500 while the toilet system is around $2,200

-Because the Warka Water is relatively easy to install, Vittori and Vogler are promoting it in the hopes of attracting investors to make it possible to set up their towers throughout Africa

- Arturo Vittori and Andreas Vogler have sought to solve this problem through the Warka Water Tower which seeks to collect clean water from the air

- This invention is shaped like a vase and 30 feet tall, so it is named after the Warka tree

-It contains an outer cover that can withstand strong winds and a mesh net that collects droplets of water

-A container at the bottom collects the drops of water that trickle down and works like a faucet to provide up to 25 gallons of clean water every day

-It is a mix of convenient, affordable, and practical because it does not need complex parts and can be put together easily

**Summary**

|  |
| --- |
| In some parts of Africa, finding drinking water is an extremely difficult and time-consuming task. Despite the high spending, water is not safe to drink because of bacteria. Arturo Vittori and Andreas Vogler have sought to solve this problem through the Warka Water Tower which collects clean water from the air. It contains an outer cover that can withstand strong winds and a mesh net that collects droplets of water. A container at the bottom collects the drops of water that trickle down and works like a faucet to provide clean water every day. It is a mix of convenient, affordable, and practical.  There have been other water saving measures, such as a special toilet system and the conventional method of digging and installing wells. Numerous philanthropists and organizations have donated to the water shortage cause, but some people suggest that the technology needed for them is too complex or that setup and maintenance costs are too expensive. On the other hand, the Tower costs approximately $500 while the toilet system is around $2,200. Due to its easy-to-install, Vittori and Vogler are promoting it in the hopes of attracting investors to make it possible to set up their towers throughout Africa. |

**[LinguaForum] b+ reading Actual Test**

**Passage 3 (p. 178)**

### Optical Illusion

**Mapping**

- The brain converts signals that it receives from the information that the eyes take in to create images in our minds

- In an illusion, there is a miscue along the process in which the images are created for different reasons

- Mach Bands effect happens when the contrasts between edges of differing shades of gray are exaggerated because of an effect called lateral inhibition

-> Lateral inhibition explains why the edges seem brighter than normal

-A cognitive illusion arises from unconscious inferences and happens based on a person’s assumptions with four types

- An ambiguous illusion can be a picture or an object that evokes two alternative interpretations

- A distorting illusion happens when there are various types of distortions in relation to shape, while a paradox illusion is an object that seems impossible

- A fiction illusion is a figure that is seen or imagined without any stimulation source

- Optical illusions are differentiated into 4 categories: literal optical illusions, physiological illusions, and cognitive illusions

-Literal optical illusion occurs when a person sees an image that is different from what is actually the object itself and artists often utilize this concept in their for works

-One famous example is “Virgin Mary on a grilled cheese sandwich” which is sold for a staggering $28,000

-> The owner of the sandwich said she saw the face of the Virgin Mary staring back at her as she took a bite from her sandwich

- A physiological illusion is usually the result of over stimulation of the brain through sight or too much interaction with a particular type of stimulus

**Summary**

|  |
| --- |
| The brain converts signals from the information that the eyes take in to create images in our minds; however, in an illusion, there is a miscue along the process in which the images are created. They are differentiated into 4 categories.  First, Literal optical illusion occurs when a person sees an image that is different from what is actually the object itself. One famous example is “Virgin Mary on a grilled cheese sandwich” which is sold for a staggering $28,000. The owner of the sandwich said she saw the face of the Virgin Mary staring back at her as she took a bite from her sandwich. Second, a physiological illusion is usually the result of excessive stimulation. For an example, Mach Bands effect happens when the contrasts between edges of differing shades of gray are exaggerated because of an effect called lateral inhibition. Finally, cognitive illusion arises from unconscious inferences and happens based on a person’s assumptions with four types. An ambiguous illusion evokes two alternative interpretations and a distorting illusion happens when there are various types of distortions in relation to shape, while a paradox illusion is an object that seems impossible. A fiction illusion is a figure that is seen or imagined without any stimulation source. |

**[LinguaForum] b+ reading Actual Test**

**Passage 4 (p. 186)**

### The Effects of the Invasive Species

**Mapping**

- There are some invasive species whose actions may be of great detriment to the creatures, especially humans

- These invasive species enter foreign ecosystems through the action of humans or migrations of animals

- One of the threats of invasive species is their capability to alter the living conditions in addition to ecosystem functions

-Second is the possibility of pushing out or even completely taking the place of the native species

-Lastly, they can cause grave damage to human activities, which can result in huge economic impacts

-As a matter of fact, invasive species rank only behind habitat destruction as the biggest threat to biodiversity, as nearly fifty percent of endangered species have a possibility of going extinct

-To put into perspective how destructive they can be, it is a greater threat than disease, harvest, and pollution all put together, as they can alter the habitat, mate with the local species or cause them to go extinct, cause diseases, or become predators or parasites

- To keep invasive species to check, counter measures can be set up to keep potential invaders from entering the ecosystem in the first place, which would be the cheapest way to deal with them

-But given that an invasive species has already infiltrated, the next best method is to quickly wipe them out before they can reproduce in great numbers

-An alternative method would be biological control, in which an “enemy” can be introduced in an effort to curb the population

-There is also a chemical control method, which is basically the use of pesticides, although this may affect species that are not meant to be targeted

-Lastly, humans or machinery can be used as a mechanical control method

**Summary**

|  |
| --- |
| There are some invasive species whose actions may be of great detriment to the creatures. These species enter foreign ecosystems through the action of humans or migrations of animals. One of the threats of them is their capability to alter the living conditions in addition to ecosystem functions. Second is the possibility of pushing out or even completely taking the place of the native species. Lastly, they can cause grave damage to human activities, which can result in huge economic impacts.  As a matter of fact, invasive species rank only behind habitat destruction as the biggest threat to biodiversity, as nearly fifty percent of endangered species have a possibility of going extinct. To put into perspective how destructive they can be, it is a greater threat than disease, harvest, and pollution all put together, as they can alter the habitat, cause diseases, or become predators. To keep invasive species to check, counter measures can be set up to keep potential invaders from entering the ecosystem in the first place. But given that an invasive species has already infiltrated, the next best method is to quickly wipe them out before they reproduce in great numbers. An alternative method would be biological control, in which an “enemy” can be introduced in an effort to curb the population.  There is also a chemical control method, which is basically the use of pesticides, although this may affect untargeted species. Lastly, humans or machinery can be used as a mechanical control method. |

**[LinguaForum] b+ reading Actual Test**

**Passage 5 (p. 192)**

### Zero-energy Buildings

**Mapping**

- can self produce all of its own energy and uses 50% less energy by using only solar panels

- use the sunlight and the resources of the earth to heat and cool the building, providing a satisfactory work environment

-And while normal buildings may expend up to 30% of their energy costs solely on lights, the new Research Support Facility in Colorado greatly diminishes this need by using as much glass as possible and being placed east to west to bring in as much natural lighting as possible to as much of the building as possible

-On top of those attributes, the building also is equipped with a smart lighting system that lets employees know through their computer screens when to open the blinds to their windows to avoid wasting electricity

- Much of the building was constructed with recycled materials, such as reclaimed steel natural gas pipes that were utilized as foundational pillars, further adding to the theme of resourcefulness

- A zero energy building presents a net energy consumption of zero, which means that the building produces the same amount of renewable energy as the total amount of energy it uses

-Energy is mostly produced with energy-generating technology that uses solar and wind power, while energy consumption is minimized by using high efficiency HVAC (heating, ventilation, and air conditioning) and lighting

-Most of these buildings get approximately half of their energy from the electrical grid, then return that same amount at a later time

-Plus, they store their energy in the grid while the rest of them operate completely separate from the grid

-Normal buildings from the U.S and European countries exhaust 40% of the yearly fossil fuel energy, adding significantly to the production of greenhouse gases

**Summary**

|  |
| --- |
| Zero-energy building can self produce all of its own energy and uses 50% less energy by using only solar panels and uses the sunlight and the resources of the earth to heat and cool the building, providing a satisfactory work environment.  A zero energy building presents a net energy consumption of zero, which means that the building produces the same amount of renewable energy as the total amount of energy it uses. Energy is mostly produced with energy-generating technology that uses solar and wind power, while energy consumption is minimized by using high efficiency HVAC.  Most of these buildings get approximately half of their energy from the electrical grid, then return that same amount at a later time. Plus, they store their energy in the grid while the rest of them operate completely separate from the grid.  Normal buildings from the U.S and European countries exhaust 40% of the yearly fossil fuel energy, adding significantly to the production of greenhouse gases. And while normal buildings may expend up to 30% of their energy costs solely on lights, the new Research Support Facility in Colorado greatly diminishes this need by using as much glass as possible and being placed east to west to bring in as much natural lighting as possible to as much of the building as possible.  On top of those attributes, the building also is equipped with a smart lighting system that lets employees know through their computer screens when to open the blinds to their windows to avoid wasting electricity.  Much of the building was constructed with recycled materials, such as reclaimed steel natural gas pipes that were utilized as foundational pillars, further adding to the theme of resourcefulness. |

**[LinguaForum] b+ reading Actual Test**

**Passage 6 (p. 198)**

### Mohenjo-Daro: Sudden disappearance

**Mapping**

-Mohenjo-daro is the name given to the remains of a settlement that was discovered in 1911

-Researchers suggest it may have been called Kukkutarma, or “the city if the cockerell”.

- Various elegant artifacts boast how much wealth the city held and wells were peppered throughout and most every house had a space for bathing and draining water

-However, excavators found that as wealthy as the Indus people were, and as advanced as their infrastructure was, it did not contain any extravagant monuments, temples, or palaces

-There also is no evidence of a central government and perhaps this lack of central rule may have been a cause for the disappearance

-Another, more likely, explanation may be that their city endured the effects of a possible change in the course of the Indus River

->This may have resulted in problems with agriculture, thus affecting the economy and the city’s position as a center for trade

-However, although this may have severely affected the people, researchers doubt that it would have caused a whole civilization to cease to exist

-With so much uncertainty surrounding Mohenjo-daro and the Indus Valley Civilization, the only sure fact is that the city was eventually abandoned

- Analysis shows that it was originally built in approximately the 26th century B.C. and abandoned sometime in the 19th century B.C.

-Literally translating to “Mound of the Dead” in Sindhi, it was one of the biggest cities of the Indus Valley Civilization and existed during the same time period as ancient Mesopotamia, Crete, and Ancient Egypt

-As the home to one of the world’s first major urban communities, it served as a major city to an Indus Civilization that spread over most of present day Northern India and Pakistan

-The Mohenjo-daro excavation site lies on a ridge in the Indus Valley flood plain on the right side of the Indus River

-Excavations show that it was the most advanced city during its existence and possessed advanced techniques and expertise in urban planning and civil engineering

- It exhibits skillfully planned street grids, structures made of baked brick, and an intricate drainage system

**Summary**

|  |
| --- |
| Mohenjo-daro is the name given to the remains of a settlement that was discovered in 1911. Researchers suggest it may have been called Kukkutarma, or “the city if the cockerell”. Analysis shows that it was originally built in approximately the 26th century B.C. and abandoned in the 19th century B.C. It was one of the biggest cities and existed during the same time period as ancient Mesopotamia, Crete, and Ancient Egypt. As the home to one of the world’s first major urban communities, it served as a major city to an Indus Civilization. The excavation site lies on a ridge in the Indus Valley flood plain on the right side of the Indus River. Excavations show that it was the most advanced city and possessed advanced techniques and expertise in urban planning and civil engineering. It exhibits skillfully planned street grids, structures made of baked brick, and an intricate drainage system. Various elegant artifacts boast how much wealth the city held and wells were peppered throughout and most every house had a space for bathing and draining water.  However, excavators found that as wealthy as the Indus people were, and as advanced as their infrastructure was, it did not contain any extravagant monuments, temples, or palaces. There also is no evidence of a central government and perhaps this lack of central rule may have been a cause for the disappearance. Another, more likely, explanation may be that their city endured the effects of a possible change in the course of the Indus River. This may have resulted in problems with agriculture, thus affecting the economy and the city’s position as a center for trade.  However, although this may have severely affected the people, researchers doubt that it would have caused a whole civilization to cease to exist.  To conclude, with so much uncertainty surrounding Mohenjo-daro and the Indus Valley Civilization, the only sure fact is that the city was eventually abandoned. |