

第一部分：選擇題(60分)

一、綜合測驗

說明：下面三篇短文共有 15 題，每篇各有 5 題，為第 1-15 題，每題 2 分，共 30 分，請依短文文意，選出一個最適合該空格的答案。

▲閱讀下文，回答第 1-5 題

With the advance of technology, people nowadays enjoy the convenience it brings more than ever. The emergence of smartphones, telemedicine, remote education, driverless vehicles, and even cryptocurrency shows that people's lives are becoming more digital, and such digitalization runs on semiconductors, also known as semis or chips. Since the technology of producing high-end chips 1 great profits, countries around the world are fighting to win the so-called chip war. 2 an international shortage of computer chips, car manufacturers have been forced to suspend production. Besides, smartphone manufacturers point out that the release of the new product may be affected. Also, components for high performance computers are difficult to find. Though the world is in 3 need of chips, not every country can meet its own demand. The world relies heavily on Asia to supply premium chips, with Taiwan's TSMC and South Korea's Samsung being the leading forces. Facing the lack of chips, technology companies in the Western world such as Intel and politicians in the US and the EU have 4 more chip-producing companies to be built locally. "Having 80% of all supply in Asia simply isn't a palatable manner for the world to have its view of the most critical technology," said Pat Gelsinger, the chief executive of Intel. To win the chip war, companies invest huge amounts of money to develop smaller, more efficient chips to win the contract in the chipmaking market. 5 enough, this war is not going to end soon.

1. (A) implies (B) requires (C) boycotts (D) collides
2. (A) In addition to (B) Regardless of (C) Due to (D) On behalf of
3. (A) sufficient (B) theoretical (C) spontaneous (D) desperate
4. (A) picked up (B) called for (C) accounted for (D) adapted to
5. (A) Unfortunately (B) Ultimately (C) Basically (D) Clearly

▲閱讀下文，回答第 6-10 題

Language acquisition refers to the process by which humans acquire the ability to be aware of and to understand language, as well as to produce meaningful utterances to communicate with each other. For a long time, scientists and linguists have been fascinated by how human babies acquire their first language, and they therefore have 6 different theories and hypotheses. Some scholars held that the word-meaning mapping in some way is innate, and that human brains are wired to acquire their native languages, which is a key aspect that distinguishes humans from other beings. That is, human brains seem to be perfectly-programmed in learning mother tongues. 7, believers of behaviorism suggested that babies learn their mother tongue as a form of operant conditioning. That is, a child may learn the sound-meaning connection through repeated successful association and get reward as reinforcement. 8 the nature and nurture debate, most scholars acknowledge that there is a sensitive period of language acquisition in which human infants have the ability to learn any language. In other words, there may be an age after which becoming a fluent and natural user of a language is no longer possible. According to the sensitive or critical period model, the period during which a child acquires the ability to use language is a 9 of how well he or she can eventually use it. It may sound depressing for second or foreign language learners because once they have passed a certain age, it may be difficult to sound like native speakers. However, studies from linguists still confirm the role of learning is still valuable 10 through mindful learning and exposure, people still have a chance to master the target language.

6. (A) postponed (B) propelled (C) proposed (D) prompted
7. (A) Likewise (B) For one thing (C) Secondly (D) On the other hand
8. (A) Following (B) Owing to (C) Despite (D) With
9. (A) predictor (B) bureau (C) controversy (D) dimension
10. (A) which (B) and that (C) where (D) that

▲閱讀下文，回答第 11-15 題

Since 2020, the COVID-19 pandemic has brought forth an unprecedented crisis. Countries around the world have witnessed the skyrocketing unemployment rate and the crashing down of oil prices. The disease leaves a damaging influence on many industries, one of 11 is the tourism industry. Since airlines are grounded and borders are closed, it is understandable that the tourism industry has undergone a really hard time. Governments around the world are struggling to find ways to save their tourism industries, which often 12 a considerable percentage of GDP in their countries. One such solution is a “travel bubble.” For countries that want to establish a travel bubble, both sides need to demonstrate success in controlling and combating the COVID-19 pandemic within their 13 borders. Once the travel bubble is established, passengers simply need to pre-screen for the virus before boarding, get tested again after they reach their destination, and then they can roam the country without undergoing on-arrival quarantine. However, a travel bubble is no 14 against infection, as some “bubbles” have been suspended due to unlinked COVID cases. What’s more, the unavoidable high cost of the bubble flight also makes 15 a lot different from budget airlines, which most people were familiar with in pre-pandemic times. In spite of the risks and concerns, there are still plenty of people willing to take their chances to get back in the air. For countries around the world, these bubbles serve an opportunity to get their economy back on track.

11. (A) them (B) those (C) which (D) whom
12. (A) coincide (B) constitute (C) torment (D) retrieve
13. (A) distinctive (B) respective (C) imperial (D) preliminary
14. (A) guarantee (B) convention (C) flexibility (D) opponent
15. (A) which (B) them (C) it (D) there

二、閱讀測驗

說明：下面三篇短文共有 15 題，每篇各有 5 題，為第 16-30 題，每題 2 分，共 30 分，請閱讀短文後，選出最適當的答案。

▲閱讀下文，回答第 16-20 題

You may have heard that eating too much red meat, such as beef or pork, makes you weaker because the “acidity” (pH levels) in your body gets higher. Likewise, you may have watched a commercial which claims that alkaline bottled water helps the pH value in your body return to a state of neutral. However, you should think twice before fully embracing these statements.

Robert Oldham Young, an American naturopathic practitioner, promoted an alkaline diet, but was convicted in 2016 for practicing medicine without a license. His most popular books are the “pH Miracle” series, which emphasize the importance of leading an “alkalarian” lifestyle. This series hit the bestseller in 2002 and has been translated into several languages. Young claimed that health mainly depended on proper balance between an alkaline and acid environment in the human body. An acid environment tended to result in cancer, obesity, skin disorder, and other diseases. In Young’s book, he recommended a low-stress, high water content, high chlorophyll, plant-based diet, etc. The so-called “acid” foods are sugar, red meat, shellfish, eggs, and the like. He stressed that the intake of these foods would overload the body with acidity and cause illness. However, recent reviews and analyses in the medical literature have concluded that there is no evidence that alkaline diets are especially beneficial to humans.

Young based his theory on a school of prominent thoughts in the late 19th century, which asserted that red blood cells would transform into bacteria when the environment became acidic. Though this theory had been proven false with the development of the germ theory, and it was not **compatible** with the scientific understanding of nutrition and disease, Young still promoted his belief and even persuaded patients to give up effective treatment and follow his practice. In some cases, he was found drawing blood from people and said they were ill, and then sold them expensive herbal products. He became famous for his treatment of Kim Tinkham for breast cancer. Both Tinkham and Young claimed that he had cured her, and they even attended The Oprah Winfrey Show. But Tinkham died of her disease shortly afterwards. In 2018, the jury ordered him to pay US\$105 million to a cancer patient who had sued him after taking his advice and giving up chemotherapy.

Young was sentenced to jail in 2017, and in court, he finally admitted that he is “not a microbiologist, hematologist, medical or naturopathic doctor or trained scientist.”

16. What is this reading mainly about?
- (A) The life of a priest. (B) A well-proven medical experiment.
(C) A new medical breakthrough. (D) A belief that harms people’s health.
17. Which of the following is closest to the meaning of “**compatible**” in the third paragraph?
- (A) affordable (B) realistic (C) consistent (D) representative
18. If a person believes in having an alkalarian lifestyle, what may he or she do?
- (A) Avoid eating red meat and choose veggies.
(B) Do voluntary work when he or she is free.
(C) Bring his or her own bags when going shopping.
(D) Have his or her blood drawn when feeling ill.
19. Based on Young’s theory, why may a person get sick when his or her body gets more “acidic”?
- (A) Because the body needs more energy to digest food.
(B) Because the red blood cells will turn into germs.
(C) Because the blood vessels will be blocked.
(D) Because germs develop better in acid environments.
20. According to the reading, which of the following is **NOT** correct?
- (A) Young’s books used to top the list of bookstores.
(B) Young cured Kim Tinkham of her breast cancer.
(C) Young convinced patients to give up other treatments.
(D) There is no direct proof that an alkaline diet will benefit people.

▲閱讀下文，回答第 21-25 題

The world has changed a lot because of the pandemic, and the importance of public health measures as well as personal hygiene cannot be emphasized more. Among the measures, hand-washing has been proven to be one of the most practical and effective ways to protect people of all ages. Nevertheless, the one who advocated this essential method was faced with mockery and mistreatment throughout his lifetime.

Ignaz Semmeiweis, a physician and scientist, was born in Hungary in 1818. He majored in law when he studied at the University of Vienna, but for some unknown reasons, he changed to medicine and was awarded his doctor's degree in medicine in 1844. After failing to gain an appointment in a clinic for internal medicine, he decided to specialize in obstetrics, a study on pregnancy, childbirth, and postpartum period. In 1846, he was an appointed assistant in the First Obstetrical Clinic of the Vienna General Hospital. Inside the hospitals were two clinics, but strangely enough, the First Clinic had a much higher maternal mortality rate due to puerperal fever, or childbed fever, than the Second Clinic (See Figure 1). The mortality rate in the First Clinic was so infamous that even Ignaz Semmeiweis felt miserable, so he started to tackle the reasons behind it.

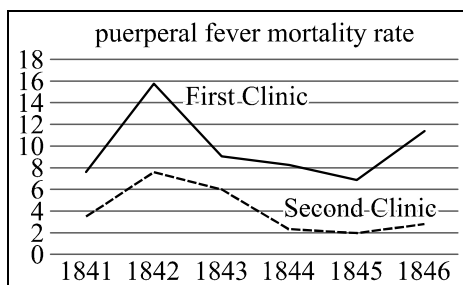


Figure 1 Puerperal Fever Mortality Rate in Clinics

To examine the reasons, Ignaz Semmelweis listed all the possible factors, and he found out the major difference was the people who worked there. The First Clinic was mainly for teaching medical students, while the Second Clinic was for the instruction of midwives only since 1841. However, his breakthrough came in 1847, when his friend died after being accidentally poked by his student's knife during an autopsy. His friend's condition was similar to that of a woman who died of puerperal fever. After that, he proposed using a solution of chlorinated lime for washing hands between an autopsy and checking patients, and the results were amazing (see Figure 2).

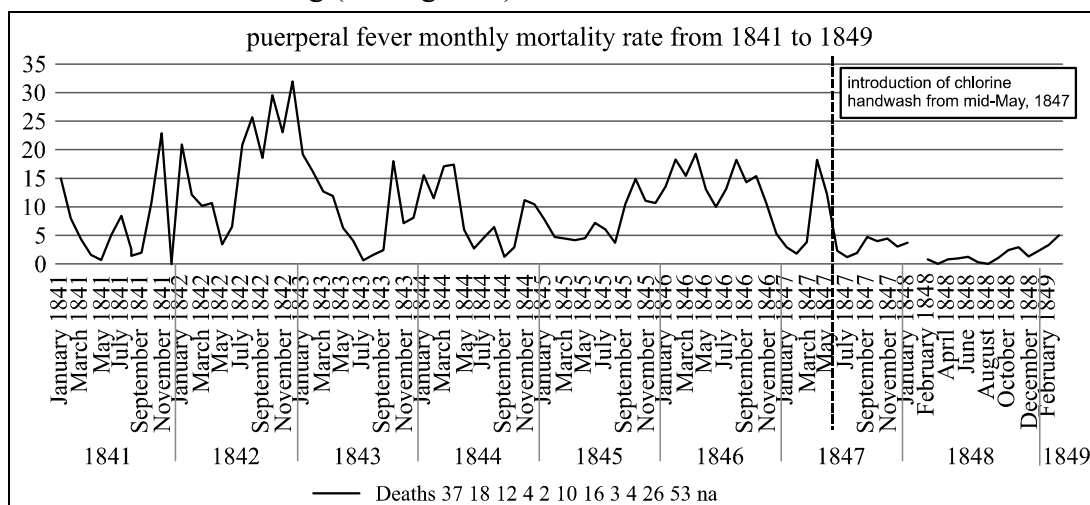


Figure 2 Puerperal Fever Monthly Mortality Rate from 1841 to 1849

Though the findings were significant enough to prove that his proposal was correct and meaningful, Semmelweis was ignored, ridiculed, and even rejected from the medicine field. His emphasis on cleanliness conflicted with the medical opinion then, when most people believed that a disease was mainly caused by the imbalance of people's "four humors," which refer to four fluids in the body. Washing hands, this simple act, was scorned by people then. Some doctors despised the practice, saying that "How can a gentleman's hand be 'dirty' and needs to be washed?" His contemporaries, including his wife, thought he lost his mind and sent him to an asylum, where he died 14 days later. His theory gained widespread recognition after his death when the germ theory and the microbiologist's research echoed his findings.

21. What can be the best title of this reading?
- (A) The Life of the Father of Medicine
 - (B) The Pioneer of Medical Engineering
 - (C) A Lonely Prophet that Saves the World
 - (D) The Development of Modern Public Hygiene
22. What can we infer from the second paragraph and Figure 1?
- (A) From 1841 to 1846, women in the First Clinic had always maintained a higher death rate.
 - (B) The mortality rate in the First Clinic doubled after Semmeiweis worked there.
 - (C) Both Clinics showed a sharp increase in the mortality rate from 1841 to 1846.
 - (D) Semmeiweis volunteered to work in the Vienna General Hospital because he wanted to turn the table.
23. Which of the following statements is **NOT** true according to the reading?
- (A) Semmeiweis did not solely study medicine when he was in college.
 - (B) Medical students received training in the Second Clinic and reduced the childbed fever.
 - (C) Semmeiweis' findings were not cherished by people at that time and even his wife.
 - (D) Obstetrics was not Semmeiweis' first choice after he received doctor's degree in medicine.
24. What can we learn from the third paragraph and Figure 2?
- (A) The death rate caused by puerperal fever was the highest at the end of 1844.
 - (B) There was a slight increase in the death rate by puerperal fever from 1841 to 1849.
 - (C) The mortality rate by puerperal fever tended to be high when the weather was hot.
 - (D) The enforcement of chlorine handwashing effectively reduced the death rate.
25. Which of the following is **NOT** the reason why people disregard Semmeiweis' findings at that time?
- (A) People could not find the right solution to wash their hands.
 - (B) His proposal contradicted the existing theory then.
 - (C) The germ theory had not been established back then.
 - (D) Some people felt insulted when asked to wash their hands.

▲閱讀下文，回答第 26-30 題

When it comes to treats that can best soothe one's soul after a tiring day or express one's deepest affection toward the other, chocolate may come as many people's first choice. The word chocolate may conjure up images of sweet bars or extravagant truffles, but surprisingly, it used to be a kind of bitter beverage.

Chocolate is made from the fruit of cacao trees. The fruits are called pods, each of which contains 40 cacao beans. To make chocolate, cacao beans should be dried and roasted. According to research, the history of chocolate can be traced back to as early as 1500 B.C., and it is believed that it first appeared in Mesoamerica. The earliest evidence showing the trace of chocolate is with the Olmecs, the earliest known major Mesoamerica culture. But since it had no written history, opinions on how they enjoyed the drink still differed. However, one thing for sure is that the Olmecs passed their knowledge on to the Central American Mayans. The Maya people revered chocolate to another level. According to its written history, chocolate appeared in many celebrations and important events. To Maya people, chocolate was the food given by gods, and they held celebrations yearly in honor of the god of chocolate. As to the way they enjoyed it, they seasoned cacao drink with chili peppers and cornmeal. From official ceremonies, religious rituals, to family gatherings, cacao beans were so important in the Maya people's lives that they even served as currency. A rabbit, for example, would cost 10 cacao beans; a slave which would be worth higher, around 100 cacao beans. Similar use could be found in 1400 when the Aztec took control of most of Mesoamerica. The Aztec asked for cacao beans as a "tribute," or a tax. Like Maya people, the Aztec also enjoyed seasoned chocolate beverages and related chocolate with god. Legend has it that god Quetzalcoatl was **denounced** by the other gods because of sharing this divine food with human beings. He was therefore punished and banished from heaven, and even his wife was killed.

As to how these highly valued beans were introduced to the Europe, there is no consensus yet. However, it is widely believed that they first arrived in Spain. According to one report, Christopher Columbus came across cacao beans on his fourth voyage to the Americas in 1502. Another saying states that a Spanish conqueror Hernan Cortes brought back the beans from the court of Montezuma, who was the emperor of the Aztec. However, these two people's efforts made little impact. Some people argued that not until the friars introduced chocolate to the Spanish court in 1544 as a gift did this treat start to take on a different flavor and become a craze among the Europeans. After the Spanish conquered the Aztecs, chocolate was imported to Europe. Because of its bitter flavor, chocolate was first used as medicine. But once sugar was added, it quickly became a court craze. The Spanish intended to recreate its original flavor by adding similar spices as people in Mesoamerica did, but the habit faded away in the eighteenth century. Later, with the introduction of machine, mass production became possible, and different types of chocolate started to emerge. In the 1890s and 1900s, the price of chocolate dropped and it became affordable to almost everyone, and the rest is history.

From a sacred food to a treat for everyone, chocolate has gone a long way from Mesoamerica to the world. As we enjoy this bittersweet snack today, it is also interesting to learn the history behind the magical beans.

26. According to the reading, which of the following best describes the route of chocolate from its origin to the world?
- (A) The Mayas → The Spanish → The Olmecs → The Aztecs
 (B) The Aztecs → The Mayas → The Olmecs → The Spanish
 (C) The Olmecs → The Aztecs → The Spanish → The Mayas
 (D) The Olmecs → The Mayas → The Aztecs → The Spanish
27. What can be the best title of this reading?
- (A) Many Usages of the Magical Cacao Beans
 (B) From the Delicacy of God to the Snack for Everyone
 (C) The Unexpected Present of Columbus' Voyage
 (D) A Brand-New Recipe for an Ancient Food
28. What does the word "**denounced**" in the second paragraph mean?
- (A) criticized (B) forgiven (C) praised (D) supported

29. Which of the following descriptions is **NOT** correct, according to the reading?
- (A) Spain is very likely the first European country that learned the magic of chocolate.
 - (B) Christopher Columbus defeated the Aztecs and took cacao beans back to Spain.
 - (C) Cacao beans used to be a kind of currency in Mesoamerica.
 - (D) Both the Mayan and the Aztecs enjoyed seasoned chocolate.
30. What can we infer from the reading?
- (A) The seasoned cacao drink is a relatively new invention originating from the 18th century.
 - (B) The Olmecs passed their knowledge of cacao beans on to the Aztecs when they were defeated.
 - (C) Cacao beans used to be so precious that people used them in exchange for commodities.
 - (D) The Olmecs used chocolate as medicine and later the Aztecs added sugar to change the flavor.

第二部分：非選擇題(40分)

一、翻譯測驗(第 1-4 題，每題 4 分，共 16 分)

(一) 中譯英(8 分)

說明：請將以下短文中劃底線處之中文句子譯成正確、通順、達意的英文，並將答案寫在「答案卷」上。請依序作答。每題 4 分，共 8 分。

近年來，臺灣選手在各項國際型賽事中紛紛嶄露頭角。(1) **無論是東京奧運(the Tokyo Olympics)或是學術類競賽，都能看到臺灣選手。**除了場上的選手以及訓練人員，場外也有無數的臺灣人給予他們全力的加油及喝采。(2) **賽場上，運動員們展現了高超的運動技巧及可敬的運動家精神，而各國的觀眾也熱情地為自己的選手喝采。**這些賽事都在無形中凝聚了各國的團結心，也讓人讚嘆選手們的恆心與毅力。

(二) 英譯中(8 分)

說明：請將以下短文中劃底線處之英文句子譯成正確、通順、達意的中文，並將答案寫在「答案卷」上。請依序作答。每題 4 分，共 8 分。

Information security refers to the practice of protecting information by lessening information risks. (3) **It involves preventing or reducing the probability of unauthorized or inappropriate access to data.** Any unlawful deed to the information, such as copying, deleting, recording, and modifying are strictly prohibited. (4) **The focus of information security is to ensure the confidentiality of the information without blocking the productivity of the company.** With the advance of technology, InfoSec is surely a concern for many companies.

二、寫作測驗(24 分)

說明：請依提示在「答案卷」上寫一篇約 120 字(8 到 12 個句子)的英文短文。

提示：(1) 隨著科技的進步，智慧型手機已然成為青少年生活中不可或缺的產品，也因此帶來生活型態的改變。請就自身經驗，敘寫擁有智慧型手機對你生活的影響。
(2) 作為一個聰明的使用者，你如何善用此科技讓生活變得更美好？

【以下空白】