

英 語

注 意

1. 問題は全部で11ページである。
2. 解答用紙に氏名・受験番号を忘れずに記入すること。(ただし、マーク・シートにはあらかじめ受験番号がプリントされている。)
3. 解答はすべて解答用紙に記入すること。
4. 問題冊子の余白等は適宜利用してよいが、どのページも切り離してはいけない。
5. 解答用紙は必ず提出のこと。この問題冊子は提出する必要はない。

マーク・シート記入上の注意

1. 解答用紙(その1)はマーク・シートになっている。HBの黒鉛筆またはシャープペンシルを用いて記入すること。
2. 解答用紙にあらかじめプリントされた受験番号を確認すること。
3. 解答する記号・番号の○を塗りつぶしなさい。○で囲んだり×をつけたりしてはいけない。

解答記入例(解答が1のとき)

1	<input checked="" type="radio"/>	②	③	④	⑤	⑥	⑦	⑧	⑨	⑩
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4. 一度記入したマークを消す場合は、消しゴムでよく消すこと。×をつけても消したことになる。
5. 解答用紙をよごしたり、折り曲げたりしないこと。

1 次の文を読み、以下の問いに答えなさい。

Permafrost, oxygen, hydrogen — it all looks like science to me.

But these terms actually have origins in Russian, Greek and French.

Today though, if a scientist is going to coin a new term, it's most likely in English. And if they are going to publish a new discovery, it is most definitely in English.

Look no further than the Nobel prize awarded for physiology and medicine to Norwegian couple May-Britt and Edvard Moser. Their research was written and published in English. This was not always so.

"If you look around the world in 1900, and someone told you, 'Guess what the universal language of science will be in the year 2000?'^A You would first of all laugh at them because it was obvious that no one language would be the language of science, but a mixture of French, German and English would be the right answer," said Michael Gordin.

Gordin is a professor of the history of science at Princeton and his upcoming book, *Scientific Babel*, explores the history of language and science.

Gordin says that English was far from the dominant scientific language in 1900. The dominant language was German.

"So the story of the 20th century is not so much the rise of English as the serial collapse of German as the up-and-coming language of scientific communication," Gordin said.
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You may think of Latin as the dominant language of science. And for many, many years it was the universal means of communication in Western Europe — from the late medieval period to the mid-17th century, and then it began to fracture. Latin became one of many languages in which science was done.

The first person to publish extensively in his native language, according to Gordin, was Galileo. Galileo wrote in Italian and was then translated to Latin

so that more scientists might read his work.

Fast forward back to the 20th century, how did English come to dominate¹² German in the realm of science?

“The first major shock to the system of basically having a third of science published in English, a third in French, and a third in German — although it fluctuated based on field and Latin still held out in some places — was World War I, which had two major impacts,” Gordin said.

After World War I, Belgian, French and British scientists organized a boycott of scientists from Germany and Austria. They were blocked from conferences and weren’t able to publish in Western European journals.

“Increasingly, you have two scientific communities, one German, which functions in the defeated [Central Powers] of Germany and Austria, and another that functions in Western Europe, which is mostly English and French,” Gordin explained.

It’s that moment in history, he added, when international organizations to govern science, like the International Union of Pure and Applied Chemistry, were established. And those newly established organizations begin to function in English and French. German, which was the dominant language of chemistry was written out.

The second effect of World War I took place across the Atlantic in the United States. Starting in 1917 when the US entered the war, there was a wave of anti-German hysteria that swept the country.

“At this moment something that’s often hard to keep in mind¹³ is that large portions of the US still speak German,” Gordin said.

In Ohio, Wisconsin and Minnesota there were many, many German speakers. World War I changed all that.

“German is criminalized in 23 states. You’re not allowed¹⁴ to speak it in public, you’re not allowed to use it in the radio, you’re not allowed to teach it to a child under the age 10,” Gordin explained.

The Supreme Court overturned those anti-German laws in 1923, but for years that was the law of the land. What that effectively did, according to Gordin, was decimate foreign language learning in the US.

“In 1915, Americans were teaching foreign languages and learning foreign languages about the same level as Europeans were,” Gordin said. “After these laws go into effect, foreign language education drops massively. Isolationism kicks in in the 1920s, even after the laws are overturned and that means people don’t think they need to pay attention to what happens in French or in German.”

This results in a generation of future scientists who come of age in the 1920s with limited exposure to foreign languages.

That was also the moment, according to Gordin, when the American scientific establishment started to take over dominance in the world.

“And you have a set of people who don’t speak foreign languages,” said Gordin, “They’re comfortable in English, they read English, they can get by in English because the most exciting stuff in their mind is happening in English. So you end up with a very American-centric, and therefore very English-centric community of science after World War II.”

You can see evidence of this world history embedded into scientific terms themselves, Gordin said.

Take for example the word “oxygen.” The term was born in the 1770s as French chemists are developing a new theory of burning. In their scientific experiments, they needed a new term for a new notion of an element they were constructing.

“They pick the term ‘oxygen’ from Greek for ‘acid’ and ‘maker’ because they have a theory that oxygen is the substance that makes up acids. They’re wrong about that, but the word acid-maker is what they create and they create it from Greek. That tells you that French scientists and European scientists of that period would have a good classical education,” Gordin said.

The English adopted the word "oxygen" wholesale from the French. But the Germans didn't, instead they made up their own version of the word by translating each part of the word into "sauerstoff" or acid substance.

"So you can see how at certain moments, certain words get formed and the tendency was for Germans, in particular, to take French and English terms and translate them. Now that's not true. Now terms like online, transistor, microchip, that stuff is just brought over in English as a whole. So you see different fashions about how people feel about the productive capacity of their own language versus borrowing a term wholesale from another," Gordin said.

Notes:

permafrost 永久凍土層, medieval 中世の, realm 分野,
the Supreme Court 最高裁判所, decimate ~の数を激減させる,
isolationism 孤立主義, -centric ~中心の, wholesale そのまま

[1] 下線部A, Bを日本語にしなさい。(解答用紙その2)

[2] 1~15の質問に対して英文の内容から判断し, 最も適切なものを一つ選び, その番号をマークしなさい。(解答用紙その1)

1. What is the best title for this passage?
 - (1) Latin and German still dominate research today
 - (2) Why do borrowed words make up a lot of scientific terms?
 - (3) Nobel prize winner research is written in English
 - (4) How did English become the language of science?

2. In 1900, people would have expected the language of science in 2000 to be

- (1) a mixture of German, French and English.
- (2) a combination of English and French.
- (3) solely English.
- (4) Latin only.

3. In 1900, the main language of science was

- (1) English.
- (2) Babel.
- (3) German.
- (4) Latin.

4. To attract a bigger audience among scientists, Galileo

- (1) wrote in Latin and later had his writings translated into Italian.
- (2) wrote in his native language and it was later translated into Latin.
- (3) wrote in both Latin and Italian.
- (4) wanted to use German and English.

5. In the early 20th century, scientific writings were

- (1) strictly in English.
- (2) still in Latin.
- (3) divided mainly among English, French and German.
- (4) controlled by the Belgians.

6. When the U.S. entered World War I,
- (1) many scientists in the U.S. favored German as the language of science.
 - (2) German could not be heard on the radio in America.
 - (3) the U.S. government encouraged youngsters to study German.
 - (4) there were many speakers of German living in America.
7. After World War I, foreign language learning in the U.S.
- (1) was discouraged.
 - (2) was encouraged in 23 states.
 - (3) was very effective.
 - (4) reached European levels.
8. Oxygen is a word that
- (1) was not used by English scientists.
 - (2) has its origins in French.
 - (3) shows how scientists in the 18th century were uneducated.
 - (4) is based on Greek terms.
9. Regarding the word "oxygen," Germans
- (1) referred to it as "acid maker."
 - (2) borrowed the term immediately.
 - (3) made up their own word for it.
 - (4) looked to English for a translation.

10. Germans today

- (1) still translate English terms into German.
- (2) borrow English terms directly.
- (3) are interested in different fashions.
- (4) demonstrate that German has a productive capacity.

11. The term "up-and-coming" means

- (1) becoming important.
- (2) about to happen.
- (3) passing.
- (4) timely.

12. The word "dominate" means to

- (1) be in an inferior position.
- (2) have power over.
- (3) weaken.
- (4) follow.

13. The term "keep in mind" means to

- (1) misunderstand.
- (2) remember.
- (3) exclude.
- (4) free.

14. The word "allowed" means

- (1) agreed.
- (2) stated.
- (3) consumed.
- (4) permitted.

15. The term "get by" means

- (1) cope.
- (2) fail.
- (3) lose.
- (4) revert.

2 以下のそれぞれの定義に従って、最初と最後の文字が与えられた最も適切な単語を書きなさい。ただし、1下線に1文字が入る。(解答用紙その2)

(解答例)

someone who is trained in science, especially someone whose job is to do scientific research

⇒(s _____ t)

正解(scientist)

1. the state of being protected or safe from harm

⇒(s _____ y)

2. physical activity that is done in order to become stronger and healthier

⇒(e _____ e)

3. chosen, done, etc., without a particular plan or pattern

⇒(r _____ m)

4. the qualities, beliefs, etc., that make a particular person or group different from others

⇒(i _____ y)

5. an exciting or dangerous experience

⇒(a _____ e)

3 次の会話文を読んで、以下の問いに答えなさい。

Yuri: When is your final exam?

Tomo: For which class?

Yuri: The one you've been (16) with. History 101.

Tomo: That would be next week on Thursday. I've got less than ten days to prepare.

Yuri: Are you going to (17) an all-nighter as usual?

Tomo: I can't (18) to take that risk this time. I really need the (19).

Yuri: So that means you will be studying every day until the exam?

Tomo: You've got it! But, Yuri, you look doubtful.

Yuri: I'm sorry. It's just that you often tell me about your plans, but I've never seen you actually (20) on them.

Tomo: Come to think of it, I think we had a similar conversation last term.

Yuri: That's right.

[1] 下の選択肢1～0の中から、上の空欄16～20に最も適切なものを一つ選び、その番号をマークしなさい。ただし、同じ語句を複数回選択してはならない。(解答用紙その1)

1. credit

2. come

3. afford

4. break

5. stuff

6. resting

7. allow

8. struggling

9. pull

0. act

[2] 次の文で、会話文の内容と一致するものは1を、一致しないものは2をマークしなさい。(解答用紙その1)

21. Yuri and Tomo are going to have the same history test.
22. Tomo has less than two weeks until his test.
23. Tomo feels that he has to pass his history test.
24. Yuri is sure that Tomo will do well on this test.
25. Yuri has heard Tomo talk about his study plans before.

