ICU EAT Script 2020

リベラルアーツ予備校 FORUM-ICU：当塾では国際基督教大学より正規の許可を得て、同大学の入試問題を公開・利用しています。なお本リスニング問題のスクリプトは大学からは公開されませんでしたので、当塾にて独自に作成しました。よって誤植や誤記等を含む誤りがあった場合、その責は、国際基督教大学に帰されるべきものではないことをご理解の上、このスクリプトをご利用ください。

Part I

Now let's begin.

#01

M: According to the weather forecast a big typhoon is on its way.

W: Do you think that tomorrow's classes will be cancelled?

M: Not sure, but we'll be able to find out by checking the University website.

W: Yeah, I guess that's better than calling the University in the morning.

#02

W: Have you visited the new dorm? It's gorgeous.

M: I know. I wouldn't mind moving into one of the Japanese style rooms there.

W: Oh yeah? I prefer one of the western style rooms.

M: No way. They are nice, but I prefer the traditional tatami rooms.

#03

W: I've lost the handout from Professor Saito's history class. Can I borrow yours?

M: Of course. It's in my apartment. Do you want to come and pick it up after fifth period today?

W: Sorry I can't. I've got to go to my part time job straight after fourth period.

M: No problem. I'll bring it to our politics class tomorrow.

#04

M: Sue, how's your English paper going?

W: Not good and I've caught a cold. It wouldn't be such a big deal if I didn't have to submit it by next Friday.

M: You'll be fine. You still have more than a week.

#05

W: Would you like to go for lunch in the new cafeteria before it gets too crowded? I heard the food is pretty good there.

M: Me, too. Let's go. And we could work on our homework together after we've eaten.

W: Maybe, or we could just hang out and relax. Let's meet at 11:30 so we can get a seat.

M: Sounds good to me.

#06

W: Professor Jakes. Can I talk to you about the topic of my final paper?

M: Sure. What have you chosen to write about?

W: I'm interested in English education in Japan. Do you think it's a good topic?

M: Yes, but it's too broad. You need to be more specific, so that you can focus on a certain aspect of English education in Japan, for example, English learning at the primary level.

W: I see.

#07

M: We can't use the library for our study group because it's closed on Sundays. Should we cancel it?

W: How about using your dorm room?

M: That's a good idea. But I'd better check with my roommate.

W: Do you think he'll mind?

M: I don't think so, but it's best to ask before we contact the others.

#08

M: Hi. I'm looking for sources for my archaeology paper, but when I search the database there are too many results. Can you help me?

W: Of course. There are several different ways to limit your results. One way is to put in a range of publication dates. Another way is to search by author or title. But I would recommend in putting specific keywords.

M: Thank you. I'll give it a try.

W: Good luck. If you still have some problems come back and talk to me.

#09

M: Excuse me. Can you tell me the way to the clinic?

W: Sure. If you go into the main building over there you'll see a flight of stairs on your right, opposite the counselling centre

M: OK

W: Go to the third floor and you will see the music room right in front of you. Turn left and walk past the study abroad office. The clinic is next to it .

M: Thank you.

#10

M: My freshman retreat is coming up next weekend. What will I have to do? Did you go last

year?

W: Yeah. It was really interesting. Professors from different majors gave mini lectures about their current research.

M: That sounds very serious. Did you do anything else?

W: Yes. there were also a lot of other activities. I played games indoors and some people went hiking or visited the observatory. I got to know my classmates and professors much better.

M: Sounds good. It will be nice to get to know people better.

Part II

Questions 11 to 12

M: Hi, Reiko.

W: Oh. Hi, taka. I didn't know you took this bus from the station to campus.

M: No. I usually ride my bicycle from here. The bus is too expensive, but it's raining so hard today.

W: Oh, I never ride my bike. The campus is too far from the station. I normally get the bus.

M: But it only takes 20 minutes by bike, and when you have to wait for the bus it takes ages.

W: Well yeah. The buses are pretty infrequent, but the worst thing is when it's too crowded to get on.

M: What do you do then?

W: I tried to share a taxi, so I won't be late for class.

M: I think you should get a bike. It would be much cheaper in the long run.

W: Oh, that sounds like too much exercise to me. Maybe the best thing would be a dorm room on campus.

Questions 13 to 15

M: Hello. Is this the writing centre?

W: Yes, hi, have a seat.

M: My name is Yoshi. Nice to meet you.

W: Yoshi, welcome to the writing support desk. I'm Wendy. Is this your first time here?

M: Yes. I feel very nervous.

W: Well, it's great that you've come. OK, each session is only half an hour, so we need to decide how we are going to use the time. Can you tell me what you like to work on today?

M: Yeah. It's my English literature paper.

W: I see.

M: Can you fix it for me?

W: Well, we aren't supposed to correct your writing.

M: Oh, no. I'm going to fail.

W: But we can work together to improve your paper. Can you tell me what problems you are having with it?

M: Well, my professor said I needed more evidence to support my ideas. But I'm more worried about my grammar mistakes.

W: OK, so evidence and grammar. Do you have your work with you?

M: Yes. My essay is in my bag. Ah, Oh, no. Where is it? I must have left it in one of my morning classes.

W: OK. In that case, it'll be better if you booked another appointment, and came back with your essay.

M: But the deadlines tomorrow.

W: It's all right. My last free appointment this afternoon starts at 2:40. Why don't you make another appointment with me then?

M: OK. I'll make an appointment and come back later.

Part III

Question 16 to 20. Listen to the lecture.

Have you ever lied to anybody? No? Then, I'm afraid you're lying. In fact, lies are a part of our daily life. For instance, you might have made up an excuse for being absent from a class. Or you might give a compliment to a friend about a bad haircut.

In fact, a key study in 1996 by a social psychologist Bella DePaulo and her colleagues revealed just how often we tell lies. They found that the adult subjects lied, on average, once or twice a day. While most lies were not offensive, they also found later that adults tell one or more serious lies at some point in their life. How about children? Another researcher Kang Lee a psychologist at the University of Toronto more recently conducted interesting studies about children's lies. Today, we're going to explore lies by looking at Doctor Lee's child development studies. They can reveal a fascinating and surprising aspect of human nature.

When you were little did your parents tell you not to deceive others? I guess so, because most parents worry if their children lie to them. Lee said that there are three common beliefs about children's lies. First, preschool children don't lie. Second, children are bad liars, so it's easy to detect their lies. Third, if children lie when they're very young they must have a character defect.　Lee's research suggests that these three beliefs are wrong.

The research was based on an experiment in which children played a guessing game with an examiner. If they correctly guessed the numbers on cards, they would get rewards. But during the game the examiner left the room with an excuse, telling the children not to peek at the cards. There were hidden cameras in the room to record the children's reactions. Surprisingly, or perhaps not, more than 90% of the children looked at the cards. Then, when the examiner came back into the room, she asked the children if they had looked. No matter what their gender, nationality, and religion was, about 30% of two-year olds lied, saying that they hadn't looked at the cards. At three years of age about 50% lied. And at four more than 80% lied. Thus, the common belief that preschool children don't lie was disproved.

Lee conducted a follow up study by showing some of the videos of the research to adults of different backgrounds. In these videos half of the children were lying, and the other half were telling the truth. The adults were tested on whether they could tell when the children were lying. The results showed that adults such as social workers, who work closely with children, couldn't detect the children's lies. Others, such as judges or police officers, who often deal with liars, couldn't, either. Even parents of the children in the videos couldn't recognise their own kids lies. Therefore, the second common belief that children are poor liars was not supported.

How about the third belief that children who lie to an early age have a character defect. Lee says that parents should actually celebrate the emergence of lies in their children, because it's a sign that the children's cognitive development is right on track. According to him, one of the requirements of lying is the development of theory of mind. Theory of mind is the ability to understand that our knowledge about a situation is different from the knowledge of others. Lee says I can lie because I know you don't know what I know. According to Lee, theory of mind is fundamental for us, because we need to understand other people's knowledge and intentions to function well in society. So, as life seemed to reflect an important stage in our cognitive development, the third common belief also seems to be rejected.

However, other researchers are not so optimistic. For instance, Victoria Talwar and her fellow researchers say children's frequent or inappropriate use of lies could be problematic. If children lie often that might indicate poor development of conscience.

Today, we looked at lies through child development studies. Studies of lying will reveal more

features of this complex and interesting behaviour. In the future, for example, we might be better detectors of children's lies and better able to understand their behaviours. So, based on what you have learned in today's lecture, do you think we should discourage children from lying?

Questions 21 to 25. Listen to the lecture.

I'm sure, at some point, you've all thought about what kind of job you want after graduation. But have you actually thought about how companies select their employees? You probably think that having the necessary skills and qualifications will be the key to your success, and you would be correct in thinking these two things will be very important.

However, in addition to skills and qualifications, knowing about a company's recruitment procedure will also be crucial to improve your chances of success. Therefore, you need to be aware that a lot of major companies have started to use technology when deciding who they hire. They do this both to save time and because they think that using certain technologies can be an effective way of finding the candidates who will best meet their needs. So, today, I'll introduce three technologies that many multinational companies have adopted. I'll, then, move on to explain briefly one of the concerns that has arisen as the result of the spread of the use of these technologies.

One very common approach is to use special computer programmes to cheque resumes. Companies use them to scan the resumes for keywords that match the potential employer's criteria. If a resume does not contain these keywords, it will be discarded. Victoria McLean, founder of a career consultancy company, estimates that these computer programmes reject 75% of resumes before human even sees them. This can save companies a huge amount of time. Let's imagine that each resume a company receives takes about 5 minutes to be reviewed by a member of a company's human resources department. That might be OK if the company only gets a hundred responses to a job ad, but what if a company receives tens or even hundreds of thousands of applications? For example, in 2016, Goldman Sachs, a multinational investment bank, received a quarter of a million job applications. If humans had reviewed all these resumes, it would have taken hundreds of hours.

Another way that technological advances have modified the traditional recruitment procedure is through the use of video interview services. Rather than talking to a person, in these interviews, candidate's responses to questions are recorded, using the camera on their

computer or mobile phone. These recorded responses are then analysed by an AI programme. Surprisingly, not only the content of the applicants answers but also less obvious aspects are evaluated, such as minor changes in their sitting position, facial expression, and tone of voice.

Lastly, and perhaps most interestingly, there's the use of computer games. Advocates of this technique such as IBM and Marriott Hotels argue that games are a very efficient way to learn about an applicant's skills and traits. One such game is called Wasabi Waiter. In this game, the applicant plays the role of the server in a sushi restaurant, and has to decide what kind of food a customer wants, based on their facial expressions. The developers of this game claim that it allows companies to know how quickly and accurately applicants can react to the expressions. More importantly, they claim that as the applicants become more involved in the game, they are more likely to show their true character. For example, the developers claim that it can show how a person reacts to a task when it becomes more challenging.

OK. Let me finish by highlighting the concern that the use of technology in recruitment can discriminate against certain types of candidates. Some argue that using AI to screen candidates can reduce the diversity of the people who are recruited. This is because the technology has been trained to make its decisions based on data collected from successful employees who currently work for the company. As a result, candidates who are selected tend to possess similar characteristics to existing employees.

Another problem is that using computer games in the selection process may discriminate against older people who may not be so comfortable with them. However, supporters of the use of technology in recruitment would probably argue that there has always been bias in the recruitment process, and that is easier to correct this bias and computers than in humans. Clearly, this is a complex issue which is very much related to the broader question of how much humans should hand over decision making to technology. This is something that we will come back to again later in the course.

Questions 26 to 30. Listen to the lecture.
Today, we're going to look at Perovskite Solar Cells commonly known as PSCs, which may have the potential to replace traditional silicon based solar panels. But before we start how many of you had a cup of coffee this morning? Probably, most of you. Me, too. Now you might be wondering what the connexion between coffee and peer seizes. Well, coffee can not only help us to function better but, as we'll see later, it also helps to be more efficient.

OK. So, as you know, solar power is one of the leading sources of clean renewable energy. Solar panels are made up of solar cells, which converts sunlight into electricity. Currently, around 90% of solar cells on the market are made of silicon. Although these traditional solar panels are becoming more efficient and cheaper to manufacture, Silicon is still relatively expensive, and most commercial cells on the market today are still only 15 to 20% efficient in converting solar energy to electrical energy. While many companies are working on improving the efficiency of Silicon solar panels, other companies are experimenting with different materials.

Perovskite is the name originally given to a mineral first found in Russia, composed of calcium titanium and oxygen. However, the chemical compounds that now get referred to as perovskites don't necessarily contain these three elements, but do have the same general formula and crystal structure as the original mineral. One property of perovskite is superconductivity. This has led to research into PSCs perovskite solar cells as there is a huge potential for them to be both efficient and low cost. But there are still some challenges to be overcome before they are widely available on the commercial market.

The main problem is their thermal instability. PSCs breakdown when exposed to sustained heat from sunlight. As you can imagine, this is a major issue for solar cells. It means PSCs are not likely to match the life span of commercial silicon solar cells typically 20 to 30 years. Now, this is where coffee comes in. Scientists at an American University UCLA have discovered that 137 try methylxanthine better known to you and me as caffeine improves both the performance and thermal stability of the PSCs. In their study the researchers made a perovskite film by mixing several chemicals and adding caffeine. Let me explain. The two reasons why caffeine was chosen. Firstly, the researchers believed it could keep perovskite stable in high temperatures, since caffeine has a boiling point of over 300 degrees Celsius. Secondly, they also believed its structure could interact with materials in the perovskite solution. The caffeine did indeed form a strong molecular lock with irons in the perovskite solution. This helped stabilise the crystal structure and greatly enhanced the thermal stability. The results of the study showed that the PSCs with caffeine achieved 1300 hours of thermal stability at 85 degrees Celsius. They also preserved 86% of their original power conversion efficiency. Conversely, at the same temperature, with no caffeine added, after just 175 hours, the PSCs only retained 60% power conversion efficiency. So the UCLA study clearly shows that caffeine improves the thermal stability and the efficiency of PSCs. Research into

perovskite solar cells is less than 10 years old, but already they are as efficient as traditional commercial silicon solar cells, which were first introduced in the 1970s. There is still work to be done, but as research into PSCs continues, it seems more and more likely that they will become commercially successful products. Now, who's ready for another coffee?