



4 THE FUTURE

A father and daughter programming a VR simulator.

Future (n) the time that follows the present time
 Collocations and idioms: *the immediate future (within the next few days or weeks), for the foreseeable future (ongoing, without a plan to end), in the not too distant future (very soon)*

Roosevelt is suggesting that you can find future success and happiness by following your dreams.

The future belongs to those who believe in the beauty of dreams.

Eleanor Roosevelt

Eleanor Roosevelt (1884–1962) was an American political activist and humanitarian and one of the most influential women of her time. She was outspoken on the issues of women's rights and equal treatment for African and Asian Americans. Roosevelt was the First Lady of the United States for 12 years during her husband Franklin D. Roosevelt's four terms as President (1933–1945) and later became the American delegate to the United Nation's General Assembly.

OBJECTIVES

- talk about future plans and goals
- make predictions about the future of work
- evaluate future predictions
- debate a range of transportation proposals
- give your opinion on automation in the workplace
- write a for and against blog post

Work with a partner. Discuss the questions.

- 1 Read the quote. What do you think Roosevelt means? Do you agree with her? Why/Why not?
- 2 What technological developments do you think will change the world in the future?
- 3 Are you generally optimistic or pessimistic about the future of the world? Why?

THE FUTURE 37

OBJECTIVES

Read the unit objectives to the class.

UNIT OPENER QUESTIONS

- 1 Read the quote as a class, then put students into pairs to discuss the questions. Monitor, encouraging students to explain their reasoning. Open the discussion up to the class, writing any useful emergent vocabulary on the board.
- 2 Draw students' attention to the image and read the caption as a class. Encourage students to share their experiences with VR and elicit one or two ideas of how it might change the world in the future. Next, put students into pairs to discuss the question. Monitor, suggesting topics (e.g. *medicine, transportation, wearable technology*, etc) if students get stuck. Bring the class back together to share their ideas, again adding any useful emergent vocabulary to the board.
- 3 Elicit the meaning of *optimistic (always believing good things will happen)* and *pessimistic (always believing that bad things will happen)*, what part of speech they are (*adjectives*) and

the noun form of both words (*optimist* and *pessimist*). Next, share one or two of your ideas about the future and elicit whether you are an optimist or a pessimist to consolidate understanding of the terms. Now, put students into pairs to discuss their own ideas. Monitor, encouraging students to explain their reasoning with clear examples. Bring the class back together to share their ideas and encourage further discussion as appropriate.

WORKSHEETS

Lesson 4.1 My future

Grammar: Future forms (W16)

Vocabulary: Noun + preposition collocations (W17)

Vocabulary: Nouns and verbs with the same spelling (W18)

Lesson 4.2 What will life be like?

Grammar: Future perfect, future progressive and future perfect progressive (W19)

Vocabulary: Intensifiers (W20)

4.1 My future

- Talk about future plans and goals
- Make predictions about the future of work

G future forms

V noun + preposition collocations; nouns and verbs with the same spelling

S identifying evidence

P nouns and verbs with the same spelling

LISTENING

A Look at the pictures (a–e). Rank these life decisions from most to least important.

B SPEAK Work in pairs. Compare your ideas from Exercise A. Explain your reasoning. What do you agree about? What do you disagree about?

C LISTEN FOR GIST Listen to a podcast about turning points in people's lives. Match the speakers to the change they talk about.

- 1 Lucy ~~a~~ planning how to spend their retirement
 2 Hadiyah ~~b~~ packing in preparation for a year of traveling
 3 Frank ~~c~~ getting organized for a new arrival

D LISTEN FOR DETAIL Listen to the podcast again. Choose the correct option (a, b or c) to complete the sentences.

- 1 Lucy is planning to ...
 a take a course in Spain c work in the UK
 b drive across Russia
- 2 Which country isn't Lucy going to?
 a Russia c Brazil
 b China
- 3 Hadiyah's husband ...
 a thinks they are having a boy. c is happy with a boy or a girl.
 b thinks they are having a girl.
- 4 Who in Hadiyah's family are they thinking of naming the baby after?
 a one of the grandmothers c one of her sisters
 b one of the aunts
- 5 Frank has just bought ...
 a a new car. c a fishing rod.
 b a new RV.
- 6 Frank is planning to ...
 a go on a cruise. c take a road trip.
 b retire in Florida.

E LISTEN FOR KEY INFORMATION Listen again. Use the table to write notes about each speaker

	Lucy	Hadiyah	Frank
What is each speaker excited about?	traveling on the trans-Siberian railroad	for everyone to meet our new baby	seeing famous landmarks like the Statue of Liberty
What hasn't each speaker decided?	whether to go to the United Kingdom	the baby's name	where to go apart from New York and Florida
What new skill does each speaker talk about?	learning Spanish	learning to manage her time a little better	fishing

F IDENTIFY ASSUMPTIONS Work in groups. Read the extracts (1–2). Do you agree with the assumptions each speaker makes? Why/Why not?

- 1 Everyone there speaks some English, anyway.
 2 Everyone wants to retire, don't they?



4.1 My future

LEAD-IN

Tell students about a big decision (real or made-up) that you are trying to make. Elicit ideas about what you should do and try to agree on one course of action as a class. Next, put students into groups to discuss decisions they or someone they know has to make and encourage them to agree on one clear solution for each. If they can't think of anything current, encourage them to talk about decisions they had to make in the past.

LISTENING



A-E Students complete the exercises, checking their answers in pairs.

F Put students into groups to discuss the assumptions. Monitor, encouraging students to give examples to support their answers. Bring the class back together to share their ideas.

AUDIO SCRIPT

4.1

Listening, Exercise C

P = Presenter L = Lucy H = Hadiyah F = Frank

P: Lenox is a small town in Massachusetts, in the US. Like many other towns in this area, not a lot has changed here over the years, but for these three residents, life is about to change forever.

Ex C **L:** Lucy Warner has just graduated from high school and is going to start studying for a law degree at Harvard in the fall of next year. However, since she's never left Lenox, she wants to take a year off to go traveling.

When I spoke to her, she was busy packing her bags.

L: Can you pass me that bag? The red one behind you ...

P: Sure. First of all, congratulations on graduating!

L: Thanks!

P: So, when do you leave?

L: Next Sunday!

P: Wow! So soon.

L: I know! Scary!

P: So, anything specific planned?

L: Well, um, I'm flying to Paris because I have a friend there. Then I'm taking the train to Spain, where I'm staying for a couple of months.

P: Oh right. Why so long in Spain?

Ex D Q1; Ex E **L:** I want to improve my Spanish. I speak a little, but it's well, just tourist Spanish really. I'm starting a month-long course in Spanish in September. The classes are three days a week from nine to four.

P: That sounds great.

L: Yeah, I don't know. It's just a little fun really. I don't really need another language – everyone there speaks some English anyway!

P: Sounds cool though. Any other exciting plans?

Ex D Q2; Ex E **L:** I'm really excited about taking the Trans-Siberian Express across Russia into Asia. I think it'll be amazing, a once in a lifetime experience. After that, I'll probably spend a lot of time in China. Then, I'm going to visit as many countries as I can.

P: All without flying?

Ex E **L:** Well I'm definitely flying to Australia! I want to work there for a few months and then I might go to the United Kingdom. I don't know if I'll have enough money, though.

Ex C **P:** Another person from Lenox about to have a massive life change is Hadiyah Khan. Hadiyah is expecting her first baby. When I spoke to her, she was busy decorating the nursery. So, big changes ahead for you.

H: Yeah, I'm a little worried about it all actually!

P: Yeah, I think that's only natural. When's the baby due?

H: At the end of May, although apparently first babies are always late! A lot of our time is going to be spent getting things ready for the baby.

P: Do you know if it's a boy or a girl?

Ex D Q3 **H:** We don't – we wanted to keep it a surprise. My husband thinks it's going to be a girl, though.

P: Oh really? Why?

H: Everyone in our family has had girls!

P: Have you chosen any names yet?

Ex E; Ex D Q4 **H:** No, we can't decide. There's the possibility of naming her Farrah after my grandma or Nabila after my husband's grandma. If it's a boy, who knows?

P: So, how do you feel?

H: I'm so excited! I've always dreamed of having children. I can't wait for everyone to meet our new baby.

Ex E I know it's going to be exhausting, though. My sister has two children and I can see it isn't easy. But, you know, it'll be a lot of fun too. I'm honestly just really excited! One thing I am worried about though is getting everything done. Parents are always really busy, so I'm definitely going to have to get better at managing my time.

Ex C **P:** At another stage of their life is Frank Schmitt. Having worked in the local bank for the last 30 years, Frank is now finally retiring. When I caught up with Frank, he was busy buying fishing equipment.

F: What do you think of this fishing rod?

Ex E **P:** Um, I have no idea – I don't know much about fishing to be honest!

F: Me neither. It's just something I finally have time to do.

P: That's right, you're retiring soon.

F: I am, I am, and I can't wait!

P: Do you think you'll miss work?

F: I suppose there's the risk of getting bored, but I doubt it. Everyone wants to retire, don't they? I'll probably just spend the first few months at home relaxing but then we're planning a big vacation.

P: A cruise?

Ex D Q5 + 6 **F:** No, but another typical senior citizen trip! We bought a huge RV and we're going to travel to different places in the US for a year.

P: Great! Where are you going to go?

Ex E **F:** We haven't planned it exactly. I'm excited to see some of the famous landmarks – the Statue of Liberty, for example. I've been to New York several times, but I've never seen the Statue of Liberty! We're going to start in New York and head down to Florida. After that I'm not sure. I'm looking forward to being more spontaneous!

P: I loved Seattle. You should go there.

F: Really? That's a good idea. I'll add it to the list!

4.1 My future

GRAMMAR



- A Play the recording for students to complete the sentences.
- B-C Give students time to complete the rules alone, before giving feedback as a class. Clarify anything they don't understand with further examples as necessary, then direct them to the **Grammar Hub** (see below). Use the **Grammar Worksheet** on page W16 for extra practice.
- D Ask students to complete the exercise alone, before giving feedback as a class.

VOCABULARY

Give students time to read the skills box alone and complete the exercise. Give feedback as a class. Use the **Vocabulary Worksheet** on page W17 for extra practice.

SPEAKING

- A Draw students' attention to the bulleted list and the example questions. Then, give them time to think of more questions.
- B Put students into pairs to conduct their interviews. Monitor, encouraging them to ask follow-up questions to extend their discussions.

GRAMMAR HUB

4.1 Future forms

- We use *will* + base form:
 - a for decisions made at the moment of speaking (including promises, offers, plans and requests).
That's a good idea – I'll call him now.
That looks heavy – I'll carry it for you.
 - b to make predictions based on personal opinions or feelings (usually with adverbs like *definitely*, *certainly*, *possibly*, etc to show how sure we are).
Tom will definitely be late – he always is!
Mom won't like that movie. It's not her sort of thing.
- We use *be going to* + base form:
 - a to talk about general intentions and plans made before the moment of speaking.
I'm going to look for a new job.
 - b to make predictions based on present evidence.
The traffic's not moving – we're going to be late!
- We use the simple present to talk about a timetabled or scheduled event.
Our flight leaves at 8:30 am on Monday.
My job interview is tomorrow morning.
- We use the present progressive to talk about future arrangements and fixed plans.
We're staying in a hostel for the first three nights.
(= *We've already booked the hostel.*)
I'm meeting Sarah at 7:30 pm outside the restaurant.
(= *We've already arranged to meet at that time and place.*)

4.1 Future forms

A Choose the correct options to complete the sentences.

- 1 I have / am having French class every Monday night at seven o'clock.
- 2 I'm meeting / I will meet friends for lunch on Sunday.
- 3 We'll probably / We're going to move this year but I'm not certain.
- 4 It looks like they will / are going to win. They're 4-0 up with only a minute left to play.
- 5 I think the plane arrives / will arrive late.
- 6 I've had enough of this job! I'm looking for / going to look for a new one.

B Complete the post with the correct future form of the verbs in parentheses. Use contractions where possible.



Emily | 20 mins ago

So, big news! I have a place at NYU to study Performing Arts, so
 1 I'm moving (I / *move*) to New York in September! Apparently, I can stay in the residence halls near the main campus, but I've decided
 2 I'm going to look for (I / *look for*) my own apartment. Wouldn't that be amazing?
 3 I'll definitely have to (I / *definitely* / *have to*) get a job to pay the rent, but it would be nice to have my own space. I've never lived in another country before, so
 4 it's going to be (it / *be*) difficult to be so far away from my family. But everyone's been so supportive! Anyway, my
 5 flight leaves (flight / *leave*) early on August 28th so if any of you want to meet up before then, just send me a message and
 6 I'll get back (I / *get back*) to you.

C Are these sentences correct or incorrect? Rewrite the incorrect sentences.

- 1 Having my young nephews to stay in the house next week ~~is being~~ exhausting! is going to be / will be
 - ✓ 2 The lecture starts at seven tomorrow evening, not eight.
 - ✓ 3 I'm afraid that we aren't going on a cruise this year. 'll will go / 'm/am going to go
 - 4 I'm feeling really tired, so I think I ~~go~~ to bed soon. going to start
 - 5 Are you ~~starting~~ looking for a job anytime soon? We're/We are meeting / We're/We are going to meet
 - 6 ~~We meet~~ Andy and Karim for lunch May 12th.
 - ✓ 7 I probably won't get there until at least ten thirty. 'll will help
 - 8 I'm ~~helping~~ you do the dishes, if you like.
- Go back to page 39.

GRAMMAR

Future forms

A Listen and complete the extracts with the correct future form of the verbs in parentheses.

- I **'m flying** (fly) to Paris because I have a friend there.
- The classes **are** (be) three days a week from nine to four.
- Then, I **'m going to visit** (visit) as many countries as I can.
- Parents are always really busy, so I **'m definitely going to have** (definitely / have) to get better at managing my time.
- Do you think you **'ll miss** (miss) work?
- That's a good idea. I **'ll add** (add) it to the list!

B WORK IT OUT Choose the correct tenses to complete the rules.

Future forms

We use the ¹**simple present / present progressive** for definite future arrangements.

We use ²**going to / will** + base form to talk about general intentions.

We use ³**going to / will** + base form for decisions made at the moment of speaking.

We use ⁴**simple present / present progressive** for timetabled events.

We use ⁵**will + base form / present progressive** for making predictions.

We use ⁶**will / going to** + base form for predictions based on something we know.

C Go to the Grammar Hub on page 128.

D PRACTICE Complete the sentences with the correct form of the verbs in the box.

break come fly go leave miss see text

- There's no milk left? OK, I **'ll/will text** Bea and ask her to pick some up.
- That chair doesn't look very strong – I think it **'s/is going to break**.
- We **'re/are flying** with JetBlue on the way out, but haven't booked the return flight yet.
- The next train to Cambridge **leaves** at 5:12 pm.
- She probably **won't come** she doesn't really like parties.
- After college, I **'m/am going to go** traveling for a year. Not sure where though.
- We're still miles away from the airport – we **'re/are going to miss** our flight!
- 'm/am seeing** her on Friday, actually. We have a meeting at 2 pm.

VOCABULARY

Noun + preposition collocations

Noun + preposition collocations

Some nouns and prepositions are commonly used together. For example, we can say *the reason for* but not *the reason of*.

Correct the prepositions in each sentence.

- Congratulations **on** passing the exam!
- I'm hoping to take a course **in** for accounting.
- I need to make more time **of** for my family.
- We're planning to visit a lot of places **in** of Europe.
- There's the possibility **of** to changing jobs next summer.
- I'm a little worried. There's the risk **of** for not getting into college.

SPEAKING

A PREPARE You are going to interview your partner about their plans and goals for the future. Write questions about:

- home
- family
- study
- travel
- work
- achievements

- 1 What are you going to do after your course finishes?
- 2 Would you like to go traveling?

B SPEAK Interview your partner. Ask follow-up questions to find out more information.

- A: When does your course finish?
 B: At the end of July.
 A: So, what are you going to do afterward?
 B: Hmm ... I'm not sure. I'll probably try and find a job in a different area.

e whether to get married

READING

A SPEAK Work in groups. Which jobs do you think will be most affected by robots in the future? Why?

B SCAN Read *The future of work* quickly. Which of your ideas from Exercise A are mentioned?

THE FUTURE OF WORK

Few people would argue that society hasn't ¹**benefited** enormously from technological advancements. However, the future of many jobs may be hanging in the ²**balance** due to the increased use of robotics in the workplace.

Exc Q1 According to Osbourne and Frey from Oxford University, almost 50% of jobs worldwide are at risk of being automated over the next 20 years. Taxi drivers could be replaced by driverless cars. In some warehouses, robots already move ³**produce** around more efficiently than workers. Even the role of teachers could be dramatically affected as more and more of the learning process moves online. There's also a greater risk of change in certain countries where there are a high number of people employed in manufacturing. For example, the World Bank

Exc Q2 estimates that some countries risk up to 60% of jobs possibly being replaced by robots and automation, simply because technology is usually able to ⁴**produce** more than human workers, with better accuracy and attention to detail. Yet many economists argue that despite the risks of increased automation, there are still many opportunities and ⁵**benefits** ahead.

Although to many this may feel like a new problem, in reality it is a ⁶**challenge** that has existed for years.

Exc Q3 Since the invention of the printing press, machines have continued to replace humans in the workplace. In fact, people have always worried about technology taking their jobs. During the Industrial Revolution in England, the Luddites – a group of clothes and textile makers – protested against new technology in factories by destroying machinery. They weren't against the technology, but they didn't like the ⁷**control** and power it gave to factory owners to make working conditions worse. In the late 1950s, there were also widespread protests across the US in response to the ⁸**influence** of automation on the shipping industry.

Although technological advances frequently ⁹**challenge** society, overall levels of unemployment have never risen consistently. Periods of increased unemployment are usually temporary and associated with a recession.

We don't run out of work – work simply changes and new **Exc Q4** jobs are created. People were once employed to open doors on trains and take people's tickets. Farmers, factory workers and elevator operators have all lost their jobs due to technological changes. People have simply moved on and found new types of employment.



Automation will no doubt ¹⁰**influence** society greatly as it starts to ¹¹**control** more and more aspects of our lives. However, arguably, it won't change the total number of jobs in the economy. Studies into the impact of automation on employment focus only on which existing jobs could be replaced. They do not address the subject of which new jobs might be created. While planes and boats may not **Exc Q5** have a crew on board, they will still need to be operated by someone remotely. As more and more of life moves online, we may find we need fewer traditional police officers and that experts in preventing online crime will become increasingly important. Jobs that we cannot even imagine right now will become vital.

While many of our jobs are no doubt under threat, it is a dramatic exaggeration to present the idea that huge numbers of people will find themselves unemployed because of automation. Humans will always be vital in the workforce, just not necessarily in ways we are used to. Technology may even free up humans to work less and allow them more free time to ¹²**balance** the pressures of work, family and other interests.



Glossary

recession (n) period when trade and industry are not successful and there is a lot of unemployment

4.1 My future

READING

A Draw students' attention to the black and white image in the text and elicit what it shows (*workers assembling cars in a factory*). Now, focus on the color image at the bottom of the page and elicit the difference (*robots have replaced the human workers*). Now, put students into groups to discuss jobs that they think may be affected like this in the future. Monitor, encouraging students to explain their reasoning. Bring the class back together to discuss their ideas and write notes on the board.

B Give students time to scan the article to see if any of their ideas are discussed. Then, give brief feedback as a class, taking time to clarify any new or unfamiliar vocabulary in the article before moving on. This could also be a good point to do some vocabulary building as there is a lot of useful language in the text that will test students' ability to manipulate words (e.g. *robot > robotic > robotics > roboticist*, etc). One way to do this is to draw a table on the board with parts of speech as the headings (e.g. *verb, noun, adjective*, etc) and elicit the various forms of a word from the class, highlighting any useful affixes.

TEACHING IDEA by David Seymour and Maria Popova

Discoveries and inventions

Use this to extend the topic of technology.

What technological developments and scientific discoveries have there been in the last hundred years? In small groups, make a list of discoveries/inventions and the advances that have resulted from them. Agree on a list of the top ten most significant discoveries and inventions. Here are some suggestions.

the wheel, electricity, the light bulb, vaccinations, nuclear fission, the silicon chip, the internal combustion engine, printing, the alphabet

What would happen if there was suddenly no electricity in the world?

TEACHING IDEA by David Seymour and Maria Popova

Science fact or fiction?

Use this activity to extend the theme of science fiction influencing real life.

Has anybody in the class read a good science-fiction book, e.g. *Brave New World* or *Fahrenheit 451*? Tell us about the kind of future society depicted in the book you read. Has any of it already come true? In small groups, discuss the ways technology can help society in the future and the ways it can also threaten society.

TEACHING IDEA by David Seymour and Maria Popova

One day ...

Use this activity to extend the theme of predictions.

I'm going to dictate one prediction about the future to each person. Mingle and collect the other students' opinions on your prediction. Write down their answers. (Dictate each sentence quickly, but go through them two or three times so that students get another chance to take down their prediction. After the survey, elicit the results and write them on the board.)

Computers will take over the world.

Time travel will be possible.

We will find life in other solar systems.

Unintelligent clones will do all the hard work.

Disease will be eliminated.

People will live on Mars.

A comet will wipe out life on Earth.

We will learn how to travel at the speed of light.

English will be the only language in the world.

METHODOLOGY HUB by Christine Nuttall

Learning when to ignore difficult words

One mark of a skilled reader is the ability to decide what may safely be ignored. This is something many students have never contemplated: it may seem wrong, because it is not done in class. Therefore it needs to be done in class to make it more respectable. It may also seem dangerous, and it is, which is why it needs to be practiced under your guidance.

When tackling a difficult text, readers should have these questions in mind:

Before reading: Why am I going to read this? What do I want to get from it?

While reading: Do I need to stop and look up the meaning of this word, or can I get the gist without it?

After reading: Do I have what I wanted? If not, where in the text is it hidden? Can I get at it by looking up any words? If so, which?

This procedure is of course not so simple to put into practice. It takes a competent reader to be aware that they are not understanding and it sometimes takes a very skilled one to be aware *why* they are not. So our responsibility includes helping students to:

- recognize that they do not understand
- locate the sources of difficulty
- develop strategies for coping with difficulty (including strategies for not wasting time on words they don't need to know).

Here are some suggested activities to help students practice when to ignore difficult words.

- 1 To show that it is possible to get the gist without understanding every word, supply a fill-in-the-blank text (lexical items omitted here and there, with omissions indicated). Ask some simple top-down questions that can be answered from the incomplete text.
- 2 The same sort of exercise as in 1, but using complete texts with difficult words which are not essential to the gist.
- 3 To help students identify the words they really need to look up, supply a short text containing a few new words and simple questions requiring understanding of some of them. The task is to see how many questions can be answered without looking up any words and to make students think very carefully before choosing which to look up. This can be done competitively, the winner having correct answers and fewest words looked up.

4.1 My future

- C** Write the following sentence on the board – *It's clear that the Earth's climate is changing.* Elicit why this isn't a good argument by itself (*no supporting evidence is given*) and what kind of evidence could be used to support it (e.g. *statistics, scientific research, news and weather reports about natural disasters*, etc). Next, elicit what structures could be used to present the evidence (e.g. *According to ... , ... states/estimates/reports that ...*, etc). Now, give students time to read the article again to find evidence to support the list of arguments. Ask them to check their answers in pairs before giving feedback as a class.
- D** Put students into pairs to discuss the questions. Monitor, helping with any new or unfamiliar vocabulary. Bring the class back together to share their ideas, encouraging students to give examples or evidence to support their arguments. Add any useful emergent language to the board.

VOCABULARY

- A** Read the first sentence in the text as a class and elicit what part of speech *benefited* is (*a verb*). Next, give students time to categorize the other words in bold before briefly checking their answers with a partner. Give feedback as a class.

Nouns: 2, 3, 5, 6, 7, 8

Verbs: 1, 4, 9, 10, 11, 12

- B** Write the first sentence on the board and elicit what part of speech is needed to fill in the blank (*a noun*) and what form it needs to be (*plural because it will complete the fixed expression, 'one of the ...'*). Next, elicit which of the words in bold from Exercise A best fits the blank (*benefit*) and how to change the form (*adding an 's' to make it plural*), before adding it to the fill-in-the-blank sentence on the board. Now, give students time to complete the remaining exercises alone before checking their answers with a partner. Give feedback as a class, eliciting which clues in the sentences helped them find the answers. Use the **Vocabulary Worksheet** on page W18 for extra practice.

PRONUNCIATION



- A** Play the pairs of sentences and for students to answer the question. Give feedback as a class, highlighting that although the spelling is the same, the stress isn't always.
No. The stress is the same in sentences 1a and b (the first syllable is stressed), but different in 2a and b (on the second syllable in 2a and the first in 2b).



- B** Play the audio for students to identify the stress in each pair. Ask them to check their answers with a partner, before giving feedback as a class. If you have time, play the audio again, pausing after each sentence for student to copy the pronunciation of each form.

SPEAKING HUB

- A** Tell students that you recently read an article about the possibility of robot dentists being used in private healthcare (or show them a picture to represent the concept). Elicit a few pros and cons of this idea, possibly building up a list of each on the board (*Suggested answers: pros – they wouldn't get tired, they are probably cheaper in the long run, etc; cons – they cannot feel or understand pain, they would be really expensive up front, etc*). Next, give students time to follow this process for the bulleted lists of jobs.
- B** Put students into groups to discuss their ideas. Monitor, helping with any new or unfamiliar vocabulary and encouraging students to justify their opinions with evidence and examples.
- C** Bring the class back together to share the key points of their discussion. Encourage other students to ask follow-up questions to stimulate class-wide discussion. Add any useful emergent vocabulary to the board.

METHODOLOGY HUB by Jim Scrivener

A few keys to getting a good discussion going

- **Frame the discussion well** Don't just jump in the deep end. It usually helps to find ways to lead in at the beginning and ways to close at the end. A lead-in may be no more than a brief focus on a picture; it could be a text that everyone reads and which naturally flows into the topic. It could be a personal recollection from you.
- **Preparation time** Your students may need some quiet time before the speaking activity, not to write out speeches (this is to be a speaking activity, not a reading aloud one), but maybe to look up vocabulary in their dictionaries, think through their thoughts, write a note or two, etc.
- **Don't interrupt the flow** If at all possible, avoid classroom management techniques that interfere with the natural flow of conversation. I'm thinking particularly about learners having to put their hands up before they speak. Try alternatives such as keeping a watchful eye on the class and noticing those small movements and looks that suggest someone wants to speak, and then invite them to speak with a gesture or by a natural comment such as *Dasha, what do you think?*
- **Role cards** Giving students brief role cards sometimes helps, e.g. You are a motorist who uses Reddo gasoline. Explain how you want to support green issues but also need to drive your car! It can sometimes be easier to speak in someone else's character than in your own.
- **Buzz groups** If a whole-class discussion seems to be dying on its feet, try splitting the class up into 'buzz groups', i.e. quickly divide the class into small sets of four or five students. Ask them to summarize the discussion so far, particularly considering if they agree with what different people have said. After a few minutes (with students still in groups), ask them to think of three comments or questions that would be interesting to share with the whole class. Then, bring the whole class back together and continue the discussion. The entire buzz-group stage may take only about three or four minutes but can help inject a lot more energy into a discussion.
- **Break the rules** Don't feel that you can never bend the above rules; sometimes, it may make sense to go straight into the discussion (possibly because you want them to get some practice at unprepared speaking or because the subject is burning so strongly that it just demands to be started immediately).

C IDENTIFY EVIDENCE Read the article again. Underline the evidence used to support the arguments below. Use the information in the box to help you.

Identifying evidence

Good writers use evidence to support the argument or point they're trying to make. This can include references to specific studies, examples and statistics.

- 1 A large proportion of jobs are at risk from technological developments.
- 2 Some countries may suffer more than others due to automation.
- 3 Jobs have always been at risk from technological developments.
- 4 Many old jobs now no longer exist.
- 5 New jobs will be created that do not currently exist.

D SPEAK Work in pairs. Discuss the questions.

- 1 Do you think society needs to worry about automation affecting people's jobs? Why/Why not?
- 2 How might the increased use of robots and automation benefit society?
- 3 What skills do you think people need to develop to protect themselves from automation?

VOCABULARY

Nouns and verbs with the same spelling

A Scan the article again. Which of the words in bold (1–12) are nouns? Which are verbs? **Nouns: 2, 3, 5, 6, 7, 8**
Verbs: 1, 4, 9, 10, 11, 12

B Complete the sentences with the correct form of the words in Exercise A.

- 1 One of the **benefits** of robotics could be more free time for individuals.
- 2 We need to **balance** the convenience of automation with the need for employment.
- 3 We should constantly **challenge** companies that get away with paying lower taxes.
- 4 There's no doubt that technology **has influenced** the way in which all industries work.
- 5 Some people think that automation gives companies more **control** over workers.
- 6 Robots make it quicker and easier for companies **to produce** their products.

PRONUNCIATION

Nouns and verbs with the same spelling

4.3 **A** Listen to the pairs of sentences. Are both forms of the words in bold pronounced the same way? **No – sometimes the word stress changes.**

- 1 **a** The key **benefit** of increased automation is greater efficiency.
- b** Technology should be used to **benefit** humans, not replace them.
- 2 **a** I think we'll all need to **upgrade** our skills.
- b** This system is an **upgrade** to the previous one.

4.4 **B** Listen to the pairs of sentences. Underline the stressed syllable in each of the words in bold.

- 1 **a** An **increase** in automation will have a negative impact on jobs.
- b** We need to **increase** the number of automated jobs in education.
- 2 **a** Robots are increasingly used to **produce** more and more products.
- b** A lot of people are eating local **produce** to reduce their environmental impact.
- 3 **a** Many people would **reject** the idea of a machine being a doctor.
- b** Products produced by machines usually lead to fewer **rejects** being made.

SPEAKING HUB

A PREPARE Would you be happy for a robot to do any of these jobs? Why/Why not? Write notes.

- a doctor
- a bus driver
- a waiter
- a sales clerk
- a teacher
- an accountant

B DISCUSS Work in groups. Discuss your ideas from Exercise A. Are there any other jobs that you think could or couldn't be automated?

C PRESENT Explain the main points of your discussion to the class. Which jobs do you think could be automated? Which couldn't? Why?

- Talk about future plans and goals
- Make predictions about the future of work

4.2 What will life be like?

- Evaluate future predictions
- Debate a range of transportation proposals

G future perfect, future progressive and future perfect progressive

S identifying agreement and disagreement

V intensifiers

P intonation with intensifiers

READING

A SPEAK Work in groups. Discuss which of the following will become common within the next decade.

- driverless cars
- virtual reality in the classroom
- space tourism
- 3D printing in the home

B PREDICT Work in pairs. Look at the subheadings in *When science fiction becomes science fact*. What predictions do you think each section will make about the future?

C READ FOR GIST Read the article quickly. Which of your ideas from Exercise B are mentioned?

D IDENTIFY OPINION Read the article again. Write Y (Yes) if the statement agrees with the writer's opinion. Write N (No) if it contradicts the writer's opinion. Write NG (Not Given) if it is impossible to say what the writer thinks.

- 1 The author thinks pollution is the main threat to cities. **N**
- 2 AI and robotics will dominate both our home and work lives. **NG**
- 3 Humans and robots will work side by side. **Y**
- 4 Social media will affect people's real-life status. **N**
- 5 People will have little contact with each other. **NG**
- 6 We need laws to restrict the influence of social media. **NG**

WHEN SCIENCE FICTION BECOMES SCIENCE FACT

In 1989, the movie *Back to the Future 2* predicted that 26 years into the future, people would make video calls, use wearable technology and tablet computers, and play video games hands-free. While these predictions probably seemed pretty unrealistic at the time, all have come true in some form or another. Even the famous hoverboard could soon become a reality, as car giant Lexus has recently developed a working prototype. So, are predictions made in movies and TV always this accurate? Here we take a look at some of the key predictions made in science fiction over the past 30 years and assess which, if any, are likely to come true.

ENVIRONMENT

Many movies set in the future show changes to our environment. *Blade Runner* is set in the year 2049 and shows a dark future in which pollution levels in the city are shockingly high, and the sun is rarely seen. The natural environment has been almost completely destroyed and industrial cities dominate the landscape. While this movie focuses on the pollution and poor air quality in major

Ex D Q1 cities, in reality the biggest environmental threat to cities is arguably rising sea levels. Recent estimates suggest that if we are unable to dramatically reduce the amount of carbon dioxide released into the atmosphere over the next few decades, ¹sea levels will have risen so much by 2050 that hundreds of millions of people will lose their homes. At present, the city most affected would be Shanghai. Projections show that the majority of the city will disappear under water if global temperatures increase by just three degrees.

TECHNOLOGY

Perhaps the most common types of predictions made in movies center around technology. According to Alex Proyas's movie *I, Robot*, by 2035 robots will have evolved to such a point that they will be able to carry out most human tasks.

²By 2035, we will have been living with computers for around 100 years, and while many predictions estimate that robots will be doing almost 50% of jobs worldwide within the next 20 years, a world like Proyas's is still a long way from reality. ³It is much more **Ex D Q3** likely robots will be working alongside humans, rather than replacing them.

4.2 What will life be like?

LEAD-IN

Before class, make a list of five predictions for the future that you think might get your students talking (e.g. *People will no longer use Facebook*). Try to avoid any overlap with the bulleted list in Exercise A of the Reading section. In class, write the following sentence on the board – *My top five predictions for 20XX* (adding a date that is at least ten years in the future). Add your predictions one by one underneath, explaining them if necessary. Don't get drawn into a discussion at this point. Now, put students into pairs to discuss whether they agree with the predictions or not. Monitor and help with grammar and vocabulary as necessary. Bring the class back together to share their ideas. Next, put students into groups to make a list of their own predictions. Again, monitor to help with language as required. Bring the class back together again to share their ideas. Encourage other students to comment, explaining whether or not they agree and why.

READING

A Show students a picture of a driverless car and elicit what it is. Next, ask students whether they think driverless cars will become popular by the year 2029. Encourage students to explain their reasoning and stimulate class discussion as appropriate. Now, put students into groups to discuss the remaining bulleted topics. Monitor and help with any new or unfamiliar vocabulary. Open the discussion up to the class, writing any useful emergent vocabulary on the board.

B–C Draw students' attention to the subheadings in the text and elicit one or two predictions for the first category. Next, put them into pairs to discuss more ideas. Monitor and support with new or unfamiliar vocabulary as necessary. Bring the class back together to briefly share their ideas. Before giving students time to read the article. Take this opportunity to discuss any parts of the text that students found surprising or confusing.

D Read the instructions as a class, clarifying that they should write Y if they can find information in the article that matches the sentence, N if they find information that contradicts it and NG if nothing is written about the topic at all. Highlight that although all of the options might sound like something the writer would say or agree with, this doesn't mean they should write Y – they must find supporting information in the text. Next, give students time to complete the exercise and encourage them to underline sentences that support Y or N answers. Then, ask them to check their ideas in pairs before giving feedback as a class. Encourage students to justify their answers with sentences from the text.

E Put students into groups to discuss the questions. Monitor and encourage them to explain their reasoning. Give feedback as a class, encouraging other students to ask follow-up questions to stimulate class-wide discussion. Add any useful emergent language to the board.

GRAMMAR HUB

4.2 Future perfect, future progressive and future perfect progressive

	Positive	Negative	Question
Future perfect	The movie will have started by the time we get there!	I won't have finished the report by tomorrow morning.	Will you have left by then?
Future progressive	I'll be seeing her on Monday, so I could ask her then.	We won't be using driverless cars for at least another 50 years.	So, what will you be doing this time tomorrow?
Future perfect progressive	In 2041, we'll have been using the internet for 50 years.	I won't have been running long enough to try a half-marathon in July.	How long will you have been traveling by then?

- We use the future perfect (*will + have + past participle*) to talk about something that will be finished before a specific time in the future.
By 2050, we will have greatly improved the air quality in our cities.
- We use the future progressive (*will + be + verb + -ing*) to talk about an action that will be in progress at a specific time in the future.
Hopefully, I'll be working in New York by then.
- We use the future perfect progressive (*will + have + been + verb + -ing*) to talk about an action or situation that will continue up to a specific time in the future.
On July 9th, I'll have been working here for seven years.
- Certain time words and expressions are used with these tenses.
In 50 years, we'll have stopped using gas-powered vehicles.
This time next year, we'll be studying in France.
By 2020, we will have been living together for 20 years.

Be careful!

- Do not confuse these three tenses. The future perfect is used for *completed* actions in the future, while the future progressive is used for actions *in progress* at a certain point in the future. The future perfect progressive refers to how long something will be in progress before a certain point in the future.

I will have paid for my house by 2025. NOT I will be paying for my house by 2025.

I will be living in the US in five years. NOT I will have lived in the US in five years.

I will have been living here for 15 years in 2025. NOT I will be living here for 15 years in 2025.

4.2 What will life be like?

GRAMMAR

- A** Focus students on the three highlighted sentences in the article, then give them time to complete the exercise alone. Allow time for students to compare their answers in pairs before giving feedback as a class.
- B–C** Add the highlighted sentences from Exercise A to the board one at a time, eliciting what tense they are (1 *future perfect*, 2 *future perfect progressive*, 3 *future progressive*) and the structure for each (1 *will + have + past participle*, 2 *will + have + been + -ing*, 3 *will + be + -ing*). Then, give students time to scan the article again for additional examples. Give feedback as a class, adding the examples to your lists on the board. Give additional explanations or examples for each tense as necessary, then direct students to the **Grammar Hub** (see below and TB42).
- D–E** Give students time to complete the sentences alone, before checking their answers in pairs. Give feedback as a class, encouraging students to explain which clues in each sentence gave them the answer. Next, put students into pairs to discuss the predictions in Exercise D. Monitor, focusing on how accurately students use the future forms covered in this section. Bring the class back together, nominating students to share the most interesting things they discussed. Use the **Grammar Worksheet** on page W19 for extra practice.

SPEAKING

- A** Tell students they are going to discuss the movie and TV predictions. Give them time to write notes about their opinions to prepare for the discussion. Monitor and help with grammar and vocabulary as necessary.
- B** Put students into pairs to discuss their ideas from Exercise A. Monitor, encouraging students to extend their discussions by explaining their reasoning and asking follow-up questions as appropriate. Bring the class back together to discuss each movie prediction one by one.

Extra activity

Write a set of future predictions on different slips of paper and put them into a hat. Try to ensure that they are interesting and can be argued both for and against (e.g. *By 2025, grocery stores will have stopped using plastic entirely; In 20 years, everybody will be driving electric cars; By the end of the decade, humans will have walked on the surface of Mars*; etc). Now hold a series of quickfire debates by calling out pairs of students to come to the front of the class, choose a sentence and argue for/against it. Alternatively, you could set up a more traditional debate, giving groups times to prepare their arguments.

GRAMMAR HUB

4.2 Future perfect, future progressive and future perfect progressive

A Choose the correct options (a, b or c) to complete the sentences.

- It's a nine-hour flight. My plane leaves at 9 am, so at 11 am, I _____.
 a 'll be flying over the Atlantic b 'll have landed in New York
- Do you really think you'll ____ at the same company in ten years?
 a have worked b be working
- This time next year, he ____ for Real Madrid for ten years.
 a 'll have been playing b 'll be playing
- Do you think you ____ English in five years?
 a 'll have studied b 'll still be studying
- Is it possible that they ____ the use of fossil fuels by the time our children grow up?
 a 'll be banning b 'll have banned
- What will you ____ at three tomorrow? If you're free, let's meet up for coffee.
 a have done b be doing
- Next Sunday, I ____ here for two years.
 a 'll have been living b 'll be living

B Complete the sentences with the future perfect, future progressive or future perfect progressive form of the verb in parentheses.

- _____ **Will you have finished** _____ (you / finish) your studies by the end of the year?
- I started learning English over four years ago, so in December, I will _____ **have been studying** _____ (study) it for exactly five years.
- Within the next ten years, robots _____ **will have taken** _____ (take) over a lot of tasks.
- What kind of world do you think we _____ **'ll/will be living** _____ (live) in 50 years from now?
- If the sea level rises, these cities _____ **will have completely disappeared** (completely / disappear) in 100 years.
- In June of next year, you _____ **'ll/will have been working** _____ (work) here for five years.

➤ Go back to page 43.

E SPEAK Work in groups. Discuss the questions.

- Which of the predictions in the article do you think will come true? Why?
- What else do you think might happen in each of the categories over the next twenty years?

GRAMMAR

Future perfect, future progressive and future perfect progressive

A Scan the article again. Match the highlighted sentences (1–3) to the things they describe (a–c).

- an action or situation that will be finished before a specific time in the future 1
- an action or situation that will continue up to a specific time in the future 2
- an action or situation that will be in progress at a specific time in the future 3

COMMUNICATION

Movies are also full of predictions about the future of communication. The communicators in *Star Trek* are incredibly similar to modern cell phones, and the 1927 classic *Metropolis* showed video calls long before the creation of Skype. Our increased reliance on smartphones is taken a step further in the movie *Her*, where the main character has a relationship with a computer operating system that has a female voice. If it's still popular in 2025, we will have been using Facebook for just over twenty years. The Netflix series *Black Mirror* shows a future where the 'like' feature of Facebook impacts on people's actual lives. The more likes someone gets, the higher their social status is in real life. As a result they can get better cars, houses and jobs. Although this is unlikely to happen, it does draw our attention to the worrying impact of social media on society.

B WORK IT OUT Scan the text again and complete the box with one more example of each tense.

Future perfect, future progressive and future perfect progressive

We use the **future perfect** to talk about something that will finish before a specific point of time in the future.

... **by 2035, robots will have evolved to the point that they will be able to carry out most human tasks.**

We use the **future progressive** to talk about an action or situation that will be in progress at a specific time in the future.

... **robots will be doing almost 50% of jobs worldwide within the next 20 years.**

We use the **future perfect progressive** to talk about an action or situation that will continue up to a specific time in the future.

If it's still popular in 2025, we will have been using Facebook for just over 20 years.

C Go to the **Grammar Hub** on page 128.

D PRACTICE Complete the predictions with the future perfect, future progressive or future perfect progressive form of the verbs in parentheses.

- I will have changed (change) jobs by the end of the year.
- I will be living (live) in the same place in thirty years.
- I will have visited (visit) five new countries by the end of the decade.
- By the end of the month, I will have bought (buy) a new phone.
- By the end of the decade, I will have been working (work) for the same company for over twenty years.
- In five years, I will still be studying (still / study) English.

E SPEAK Work in pairs. Which predictions in Exercise D do you think will become true for you? Why?

SPEAKING

A PREPARE Read the following predictions from different science fiction movies. Which do you think will become true? Write notes.

Police will be able to predict the future, preventing serious crimes before they happen. *Minority Report* (2002)

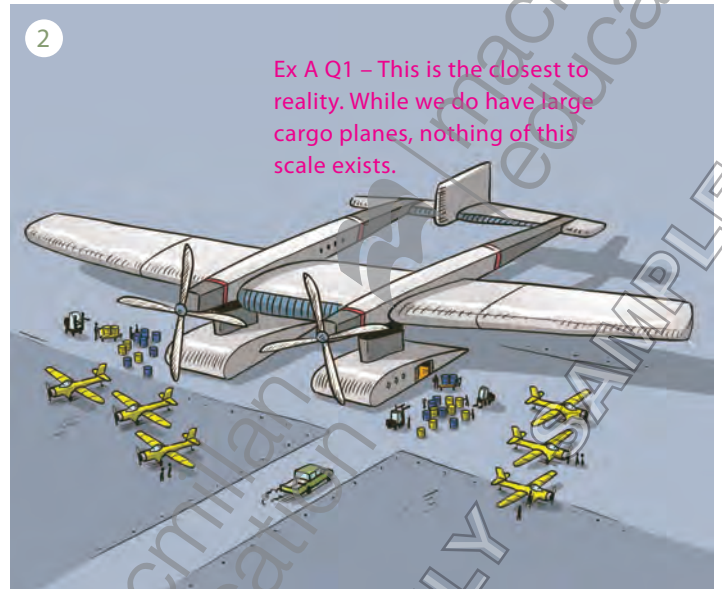
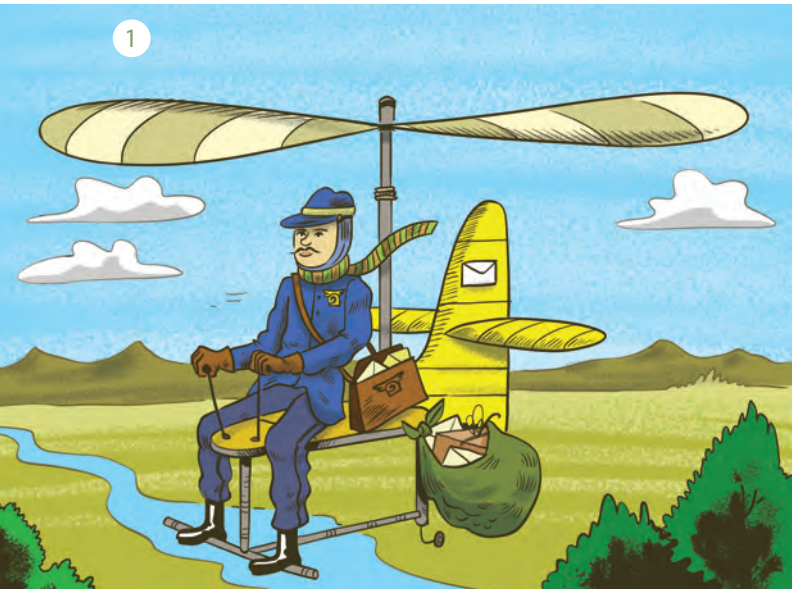
You will be able to pay to have your memory of a relationship that went wrong permanently erased. *Eternal Sunshine of a Spotless Mind* (2004)

Humans will learn how to communicate with aliens. *Arrival* (2016)

The Earth will be so damaged that humans will look for a new planet to call home. *Interstellar* (2014)

The rich will control cities from high-rise towers, while the poor will work machines underground. *Metropolis* (1927).

B SPEAK Work in pairs. Compare your ideas from Exercise A. Explain your reasoning.



LISTENING

A SPEAK Work in pairs. Look at the pictures (1–3) and discuss the questions.

- Which of the predictions about future transportation came true?
- Which didn't come true and why do you think they failed? **None of the predictions came true.**
- How do you think transportation will change over the next ten years?

B LISTEN FOR GIST Listen to a public debate about the future of transportation. Put the modes of transportation in the order they are discussed.

- | | |
|---------------------|--------------------|
| 4_ hypersonic jets | 1_ driverless cars |
| 2_ hyperloop trains | 3_ flying bikes |

C IDENTIFY AGREEMENT AND DISAGREEMENT Listen again. Who makes the following points – Mark or Sarah? To what extent do they agree with each other? Use the information in the box to help you.

Identifying agreement and disagreement

When arguing about a topic, speakers use expressions such as *I completely agree*, *I can't see ...*, *Yes, but ...*, etc to signal agreement or disagreement. These are typically followed by reasons and examples to counter or support the original point.

Speakers also highlight agreement or disagreement by responding with a single adverb (e.g. *Seriously?*, *Definitely!*, etc).

- Driverless cars will soon become a common sight on our roads.
- Driverless cars have better reactions than human drivers.
- Hyperloops are safer than existing train systems.
- Hyperloop train systems are unlikely to get the funding they need.
- We're unlikely to develop flying cars within the next two decades.
- There may be a market for space tourism in the future.

D SPEAK Work in pairs. Read the driverless car scenario Sarah describes in the discussion. What do you think the car should do? Explain your reasoning.

How can a car make a decision about what to do in a dangerous situation? Should it protect the driver at all costs? What if doing so might mean injuring somebody else? What does it do then? I just think it would be incredibly dangerous to have driverless cars on the road.

VOCABULARY

Intensifiers

A Read the extracts from the discussion. Complete the definitions below with the words in bold.

- The way we get around is going to be **entirely** transformed.
- I **firmly** believe there is no chance driverless cars will become popular.
- It's **undoubtedly** true that driverless cars will have more consistent and quicker reactions than most drivers.
- But it would **greatly** improve our lives!
- Hyperloop train systems are **widely** expected to happen.
- ... **especially** things that save significant time, like the Hyperloop train...
- ... it will become **significantly** cheaper over time.
- You seem **incredibly** focused on speed!

- entirely** completely, or in every way
- significantly** in a way that is relevant or that has an important effect on something
- undoubtedly** used for saying that something is certainly true or is accepted by everyone
- greatly** very much
- incredibly** extremely
- widely** by a lot of people, or in a lot of places
- firmly** strongly
- especially** used when mentioning conditions that make something more relevant, important or true

4.2 What will life be like?

LISTENING

- A** Draw students' attention to the illustrations and put them into pairs to discuss the questions. Monitor, helping with new or unfamiliar vocabulary as necessary. Bring the class back together to share their ideas, encouraging further discussion as appropriate.
- B** Play the audio for students to order the modes of transportation. Ask them to briefly check their answers in pairs before giving feedback as a class. If necessary, ask CCQs at this point to check student understanding of *hypersonic jets* (e.g. *How are hypersonic jets different to regular planes?*) and *hyperloop trains* (e.g. *What do hyperloop trains travel through?*). See the **Audio script** below and TB45.
- C** Write the following sentence on the board – *By the year 20XX* (add a date at least ten years in the future), *everyone will be using driverless cars*. Ask students whether they agree or disagree, building up a list of the signaling phrases they use on the board (e.g. *I completely disagree because ... , I agree with you up to a point, but ...*, etc). Ask how people can show agreement or disagreement with only one word (e.g. *Absolutely! Nonsense!* etc) and add examples to your lists on the board. Tell students they are going to listen to the debate again and highlight that they need to do two things – identify which speaker makes each statement and write notes about whether the other speaker agrees with them or not. Now, play the audio again for students to complete the exercise. Put students into pairs to compare their answers before giving feedback as a class.
- 1 Mark. Sarah disagrees, saying, '... it is absolutely ridiculous' and that she firmly believes '... there is no chance driverless cars will become popular.'
- 2 Mark. Sarah partially agrees but says '... it's still slightly concerning.'
- 3 Mark. Sarah agrees, saying, 'Yes, they are very safe.'
- 4 Sarah. Mark disagrees, saying, 'Hyperloop train systems are widely expected to happen. Countries around the world are investing time and money into their own Hyperloop systems.'
- 5 Sarah. Mark disagrees, saying, 'I don't think (we're 25 years away from anything like a flying car)' and gives the example of flying bikes in the Dubai police force.
- 6 Mark. Sarah partially agrees, saying, 'There may be a small market for it, but only among the super-rich.' There may be a small market (for space tourism) ..., but goes on to say only rich people will be able to afford it.
- D** Talk students through the scenario Sarah describes, using a diagram to support students' understanding. Next, put students into pairs to discuss the dilemma. Monitor, encouraging students to explain their reasoning with examples. Bring the class back together to share their ideas, exploring any differences of opinion.

VOCABULARY

- A** Write the following sentence on the board – *I disagree with you*. Now elicit what you could add to the sentence to make it sound more emphatic, adding an intensifier (e.g. *totally, completely*, etc) to the sentence in a different color when/if one is mentioned. Tell students that adverbs used like this are often referred to as intensifiers, and give them time to complete the definitions for the intensifiers in bold. Ask them to check their answers in pairs before giving feedback as a class.

AUDIO SCRIPT

4.5

Listening, Exercise B

P = Presenter M = Mark S = Sarah

P: Good morning, everyone. Welcome to today's debate. Transportation is changing rapidly around the world. More and more cars are becoming electric. Drones are being used for deliveries. So, of all the future predictions about transportation and travel, which are most likely to come true? Here to discuss this with me today are Sarah Atkinson, technology blogger and editor at *The Neo Futurist*, and Mark Edwards, transport correspondent for *The Evening Express*. So, first, let's talk about driverless cars – do you think we will see these on our roads any time soon?

Ex B M: Definitely! The way we get around is going to be entirely transformed. It's not a matter of *if*, but when this happens. These are incredibly exciting times!

Ex C Q1 P: Sarah, what do you think?

S: Sorry, but that is absolutely ridiculous. I firmly believe there is no chance driverless cars will become popular. How can a car make a decision about what to do in a dangerous situation? Should it protect the driver at all costs? What if doing so might mean injuring somebody else? What does it do then? I just think it would be incredibly dangerous to have driverless cars on the road.

M: People's reactions and decision-making are absolutely terrible! It's undoubtedly true that

driverless cars will have more consistent and quicker reactions than most drivers.

S: Maybe, but it's still slightly concerning. Driverless cars frequently crash during testing. A driverless bus crashed in its first *hour* of tests in Las Vegas! It's a dangerous development and we simply don't need it.

M: But it would greatly improve our lives! We could work in the car on the way to work. We could have a second car that took the kids to school. You could jump in and out of driverless taxis just paying with your card.

S: The level of associated risk is crazy! Imagine if the car taking your kids to school had an accident. It's a terrifying idea, but fortunately I think it's highly unlikely to happen any time soon.

Ex B P: OK, so what about the Hyperloop? Elon Musk's vision of future trains? A pod travels through a tunnel with no friction or air resistance, making it a very fast and efficient way of travelling.

M: Well, I for one think they're an incredibly safe alternative to our current train systems. They could also cut trip times down by 80 to 90%. Imagine that. A four-hour train ride could be completed in less than an hour!

Ex C Q3 S: Yes, they are very safe, but it won't happen. A Hyperloop train has to be in a fixed tunnel using air pressure and magnets to move the train. The big problem is that they are likely to run just between a few points that are miles apart and go past all of the other big places in between. They will literally go straight past millions of passengers. Governments simply won't spend the money and companies won't either because it will be hard to make a profit.

Ex C Q4

4.2 What will life be like?

- B–C** Give students time to complete the sentences alone before checking their answers with a partner. Give feedback as a class, before directing students to the **Vocabulary Hub** (see TB121).
- D** Read the bulleted list of topics as a class, then give your opinion on one of them using an intensifier to demonstrate the activity. Next, put students into pairs to practice themselves. Monitor, encouraging students to ask follow-up questions to keep the discussions going. Bring the class back together for further discussion if you have time. Use the **Vocabulary Worksheet** on page W20 for extra practice.

PRONUNCIATION

- 4.6** **A** Explain that we not only use intensifiers to make sentences grammatically more emphatic, we also use intonation to highlight them. Then, play the extract for students to answer the questions.
- A rise-fall intonation is used to emphasize the adverb.*
- 4.7** **B** Play the audio, pausing after each sentence for students to copy the intonation used on the intensifiers. Provide further individual and choral practicing as necessary. If you want to, you could extend this section by putting students into pairs to write their own sentences with intensifiers and practice saying them with emphatic intonation.

SPEAKING HUB

- A** Tell students that a new form of transportation is going to be built in your city and ask them to briefly read through the three options. Encourage them to write down at least two advantages and two disadvantages for each transportation option.
- B** Divide the class into three groups (A, B and C) and allocate each a mode of transportation from Exercise A. Explain that you are going to debate which is the best form of transportation for your city and that each group will be given time to present their arguments. Give groups time to discuss ideas and encourage them to write notes about the weaknesses of the other forms of transportation to help them in the debate (e.g. *The Eco Bus will only cost \$300 million to build unlike the others which are much more expensive.*).
- C** To begin the debate, ask each group to present a summary of why their mode of transportation is the best. Encourage students to write notes during the oppositions' summaries because this will help them to argue their point. With a weaker class, you may want to allow extra time for the groups to work to come up with counter-arguments based on their notes from the opening summaries. Once each group has presented their argument, let the debate begin. During the debate, ensure that all students have an equal chance to participate by nominating individuals to share opinions and respond to points. Allow time at the end for each group to summarize their key points again, then take a class vote to decide which group's argument was most convincing.

4.5 (continued)

Ex C Q4 M: Nonsense! Hyperloop train systems are widely expected to happen. Countries all around the world are investing time and money into their own Hyperloop systems. They're undoubtedly cheaper than building a normal high-speed train and travel times will be greatly reduced. Dubai to Abu Dhabi, normally a two-hour drive, would take just 12 minutes on a Hyperloop train! Why wouldn't cities invest in it?

P: I can imagine some of these developments happening – especially things that save significant time, like the Hyperloop train, and things that free up personal time, like driverless cars. I can imagine companies investing in and developing these ideas because they could make a lot of money, but what about something more futuristic, like the flying cars we see in movies?

M: This always seems like something purely from science fiction, but I don't think flying cars are actually that unrealistic. The technology isn't that far off...

Ex C Q5

S: Oh, come on. I think you're exaggerating there! We're at least 25 years away from anything like a flying car.

M: Hmm, I don't think so. Dubai police already have self-driving cars and robot police officers. Now they're adding a flying bike to their force. It will greatly improve response times in cities with serious traffic problems.

Ex B

S: The laws and the health and safety issues here would be frightening!

M: Yes, but society has dealt with major changes before. Imagine what it was like on the early passenger planes

taking people on vacation.. That must have been surprising to society and a lot of rules and laws must have been needed, but society coped and moved on.

P: Actually, that brings me to my next point. What about the travel industry? How do you see that changing?

Ex B; M: Well, I think we're likely to see hypersonic jets and space tourism in the not too distant future.

Ex C Q6

S: Space tourism? I can't see that really taking off – if you'll excuse the pun! There may be a small market for it, but only amongst the super rich.

M: Well, we'll see about that. But when it comes to hypersonic jets, I have no doubt that the technology is improving all the time and it's very likely it will become significantly cheaper over time. That means it would be affordable for most people. The Sabre jet developed in the UK could get you from Britain to Australia in four hours. That's almost 20 hours quicker!

S: You seem incredibly focused on speed! I'd be much more interested in a solar plane that was better for the environment. Even if it took me an extra day to get somewhere! In general people think more about the environment today. It's a bigger concern than speed.

M: That could happen as well. I absolutely love the idea of getting places quicker, though. Who wants to sit on a plane for two days? I somewhat agree with your opinion on space travel, though. It's an experience rather than a vacation.

P: Thank you both. Now let's move on to the Q&A section of the debate. Does anyone have any questions on driverless ...



B Choose the correct intensifiers to complete the sentences.

- Many of these inventions seem *undoubtedly* / *incredibly* unlikely to happen.
- It's *entirely* / *greatly* possible that all cars will be driverless in the future.
- There are *significantly* / *firmly* more passengers using the system than it was designed for originally.
- Travel times would be *greatly* / *entirely* improved.
- You are *undoubtedly* / *especially* right.
- I *firmly* / *widely* believe that safety is more important than convenience.
- That is *especially* / *widely* true when it comes to a company making a profit.
- It is *significantly* / *widely* believed that commercial flights will eventually be powered by solar energy.

C Go to the **Vocabulary Hub** on page 145.

D SPEAK Work in pairs. Use intensifiers to give your opinions on the topics below.

- the likelihood of space tourism
- police traveling by hover bikes
- the widespread use of hyperloop trains

Space tourism in our lifetime seems incredibly unlikely.

PRONUNCIATION

Intonation with intensifiers

A Listen to the extract from the debate. What intonation does the speaker use on the intensifiers: rising (↗), falling (↘) or rise-fall (↗↘)? What effect does this have?

4.6

They're *undoubtedly* cheaper than building a normal high-speed train and travel times will be *greatly* reduced.

B Listen and repeat the sentences.

4.7

- The city is *incredibly* congested!
- The idea is *entirely* unrealistic. It will never happen.
- Considering the environmental impact has become *increasingly* important.
- Travel times will be *greatly* reduced.

SPEAKING HUB

A PLAN Read the information cards and write notes about the advantages and disadvantages of each form of transportation.



CITY TRAIN

- Completion:** 2030
- Design:** Spacious and modern. Built-in wi-fi. First-class meeting tables
- Cost:** \$5 billion
- Ticket cost:** \$10 day ticket
- Speed:** Much faster than road vehicles. Delays less likely



ECO BUS

- Completion:** 2022
- Design:** Eco-friendly using renewable energy
- Cost:** \$300 million
- Ticket cost:** \$3 day ticket
- Speed:** Faster than cars because it uses a designated bus lane. Delays possible



TROLLEY SYSTEM

- Completion:** 2025
- Design:** A simple subway train. Many roads will need to be redesigned to fit trolleys
- Cost:** \$2 billion
- Ticket cost:** \$5 day ticket
- Speed:** Relatively slow-moving. Delays possible

B PREPARE Work in three groups. You are going to propose a new transportation system for your city. Group A – City Train, Group B – Eco Bus, Group C – Trolley System. Prepare your arguments.

C DISCUSS Debate the best method as a class. Remember to question the weaknesses in the other methods.

○ Evaluate future predictions

○ Debate a range of transportation proposals

▶ Flippy the robot COMPREHENSION

- A** Work in pairs. You are going to watch a news report about a burger-flipping robot. What do you think the advantages and disadvantages of this kind of technology are?
- B** ▶ Watch the report. Which of your ideas from Exercise A are mentioned?
- C** ▶ Watch again. Complete the sentences with no more than three words from the report.
- A combination of image recognition and **heat-sensing technology** tells Flippy which burgers need turning over.
 - The introduction of Flippy may lead to **fewer human employees** in the future.
 - CaliBurger will spend an estimated **twelve thousand dollars / \$12,000** a year on maintenance.
 - Human employees frequently find the working conditions difficult and many leave after **a few weeks**.
 - Flippy isn't fully autonomous yet and regularly **made mistakes** that a human employee wouldn't.
 - David Zito, the CEO of Miso Robotics, is confident that Flippy **will get smarter** with time.
 - The presenter believes it won't be long before Flippy can both **prepare (the) food** and serve customers.
 - Roboticians predict that new **jobs** _____ will emerge to replace those lost.
- D** Work in groups. Do you agree with the following predictions made in the report? Why/Why not?
- It won't be long before the majority of unskilled jobs are automated.
 - In the future, it will be odd to go to a restaurant that isn't almost fully automated.

AUTHENTIC ENGLISH

- A** Read the extract from the report. Why do you think the speaker says *right*?
- It's not a very fun job, **right**? Er, it's hot, it's greasy, it's dirty, erm, it hurts your wrist, **right**?
- B** Read the information in the box and check your answers to Exercise A. **Right is used instead of a question tag to check information or to ask if the listener agrees.**

right

In informal spoken English, speakers frequently use *right* in place of a question tag to check information or to ask if someone agrees with them.

You have tomorrow off, right?

(= You have tomorrow off, don't you?)

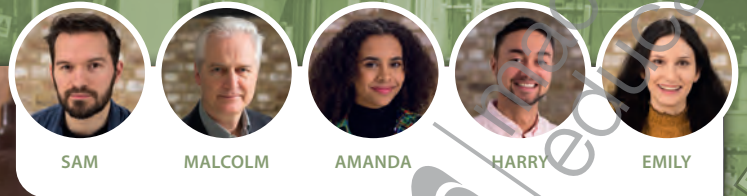
You know where you're going, right?

(= You know where you're going, don't you?)

- C** Read the extract in Exercise A again. Which regular question tags could be used instead of *right*?
It's not a very fun job, is it? It hurts your wrist, doesn't it?
- D** Work in pairs. Take turns using prompts (1–6) to make sentences with *right*.
- You want to check that the movie starts at 9 pm.
 - You think your friend has met Yuki before.
 - You're not sure if a friend can speak Japanese.
 - You think a colleague is going to Seville next week.
 - You think a friend finishes early on Fridays.
 - You want to check if your friend knows how to get to the station.
- So, the movie starts at 9 pm, right?*



▶ The perfect coffee



SAM

MALCOLM

AMANDA

HARRY

EMILY



A Work in pairs. What's your favorite café? Why do you like it so much?

B ▶ Watch the video. Choose the best summary (1–3) of what Sam thinks customers want from an independent café.

- 1 They want to be served quickly and efficiently.
- 2 They want to make use of the latest technology.
- 3 They want to feel like a valued part of a community.

SPEAKING SKILL

A ▶ Watch the video again. Complete the box with examples from the conversation.

Asking for clarification

In conversation, we frequently need to check that we have understood something correctly. A common way to do this is to use a signaling phrase followed by an explanation of what we think the speaker meant.

Sam: *I want the people who come to our café to feel that it is their space. So I often allow local clubs to hold meetings here or we host events like book signings or talks.*

Amanda: *So you mean that the café can be a hub for the local community?*

We use a number of other phrases for asking for clarification, some of which are more formal than others:

More formal

- 1 *Correct me if I'm wrong ...*
- 2 *... just so I understand correctly ...*

Less formal

- 3 *Is that right?*
- 4 *How do you mean?*

B Work in pairs. Tell your partner about your job or a job you would like to have. Listen to your partner and ask for clarification of what they tell you. Then swap roles.

Talk about:

- what skills and knowledge you need
- who you work with
- what you like/dislike about the job
- what your responsibilities are
- what equipment you use

SPEAKING HUB

A PREPARE Work in pairs. You are going to conduct an interview about increased automation in the restaurant industry.

Student A – You are a journalist. Choose which questions to ask from the list below and add some of your own.

Student B – You are the interviewee. Write notes about your responses to the questions below.

- How might the industry benefit from increased automation?
- Which jobs do you think are most at risk from this trend?
- How do you think the public would react?

B SPEAK Conduct the interview. Ask each other for clarification if you need to.

Correct me if I'm wrong, but you seem to be saying that you'd be happy for robots to help prepare, but not serve your food. Is that right?

C DISCUSS As a class, discuss whether increased automation in the workplace is mainly positive or negative.

○ Give your opinion on automation in the workplace

▶ Turn to page 157 to learn how to write a for and against blog post.

4.3 The robot revolution

Flippy the robot

LEAD-IN

Elicit five tasks that a chef has to do every day (e.g. chop vegetables, boil pasta, etc). Then, discuss whether each could be automated or not. Now, put students into groups and give each a different job to discuss (e.g. lawyer, taxi driver, etc) in the same way. Bring the class back together to share their ideas.

COMPREHENSION

- A-B** ▶ Elicit one or two advantages and disadvantages of technology like Flippy. Then, put students into pairs to discuss more. Bring the class back together to share their ideas, then play the video to see which are mentioned.
Advantages: saves the company money in the long term, safer, more consistent results, removes the need for monotonous jobs
Disadvantages: makes regular mistakes, robot not totally autonomous, can't actually hand the burger over to the customer
- C** ▶ Play the video again for students to complete the exercise. Give feedback as a class.
- D** Put students into groups to discuss the predictions. Monitor, encouraging students to justify their answers.

AUTHENTIC ENGLISH

- A-B** Put students into pairs to discuss the extract. Then, give students time to read the skills box to check their answers.
- C** Give students time to complete the exercise and briefly check in pairs before giving feedback as a class.
- D** Read the first sentence and the example at the bottom to demonstrate the exercise. Then, put students into pairs to practice using *right*.

The perfect coffee

LEAD-IN

Elicit one or two ideas from the class about what makes a good café, then put students into groups to discuss more. Bring the class back together to share their ideas.

- A** Tell students about your favorite café in the area, explaining how often you go there and why you keep going back. Next, put students into pairs to discuss their own favorite cafés.
- B** ▶ Tell students they are now going to watch the next episode of the Café Hub series. Give students time to read three potential summaries, before playing the video for them to choose the best one. Give feedback as a class. You can find the **video script** for *The perfect coffee* on the Teacher's Resource Center.

SPEAKING SKILL

- A** ▶ Read through the example in the skills box before playing the video again for students to write down more examples. Give students time to briefly check their answers in pairs before giving feedback as a class.
- B** Give students time to write notes about each bullet point, then put them into pairs to discuss their jobs.

SPEAKING HUB

- A-B** Put students into pairs, assigning each a role to play and giving them time to write notes. Monitor, helping with grammar and vocabulary as necessary. Then, ask them to conduct their interviews.
- C** Ask one or two pairs to share the ideas they discussed in their interview as a way to open up class discussion.

▶ VIDEO SCRIPT

Flippy the robot

P = Presenter C = CaliBurger rep D = David Zito

- Ex C Q1** **P:** This is Flippy, a robot that can replace one of life's most basic unskilled jobs. It uses image recognition and heat-sensing technology to know which burgers need flipping. It can handle at least 12 burgers at once. But like so many instances of robotics appearing in the workplace, there's little doubt over what the eventual impact will be.
- C:** There will be changes in the way workers are hired and the types of jobs available, but ...
- Ex C Q2** **P:** What does that mean? Does that mean a typical restaurant in the future might have fewer human employees than it does now?
- C:** I... I... I think... I think that is... is very possible.
- Ex C Q3** **P:** Flippy is being installed in 50 locations run by California-based chain, CaliBurger. Each robot costs the company \$60,000, plus \$12,000 a year to run. The first robot will be found here, in Pasadena, just north of Los Angeles.
- C:** It's not a very fun job, right? Er, it's hot, it's greasy, it's dirty, erm, it hurts your wrist, right? So people come in and we train them, which is a significant expense, they work for a few weeks and then they leave, so the robotic systems make a perfectly consistent burger across all of our restaurants, everywhere in the world.
- Ex C Q4**

- Ex C Q5** **P:** It still does need a bit of a helping hand, however, and it made regular mistakes that no human ever would.
- D:** If I threw anybody in behind a grill tomorrow, right? And asked them to start cooking. Would you make a mistake? Would you accidentally forget to flip a burger? That's why there's a human at the end of this process, right? And so it's an assistant. This will get smarter and smarter over time. We're really just getting started with what this technology can do.
- P:** So this is ...
- D:** Here we go!
- P:** ... the robot-made burger. I've had a few burgers in my time – that's pretty good. Flippy is obviously pretty sophisticated and it does replace some of the monotonous tasks in a typical fast-food kitchen. What it can't do yet, of course, is actually prepare the food and hand it over to a customer, but you've got to think – it's surely only a matter of time.
- Ex C Q7** **C:** A day will come where it will be odd to go into a restaurant where you don't have all the benefits of robotic systems, right? Where you're not, you know, confident in the safety and security of the food because there's humans touching the food.
- Ex C Q8** **P:** Robot makers say jobs will eventually emerge to replace what's lost, though nobody yet seems to know what those jobs might be. Dave Lee, BBC News in Pasadena.

4 Writing

Write a for and against blog post

W—structuring a for and against blog post

A Read the introduction to the blog post. What issue is the writer going to discuss? **Whether or not to ban cars from city centers to address congestion.**

B Work in pairs. Brainstorm ideas for and against the issue.

C Scan the blog post. Which of your ideas from Exercise B are mentioned?

About Blog Contact Search

In order to deal with congestion in cities, some people think that private vehicles should be banned from city centers. Others, however, feel that this is an unrealistic solution and that alternatives would work more effectively. This post will consider both perspectives.

¹One of the arguments in favor of banning cars is that they are simply unnecessary if public transportation is effective. The needs of individuals can arguably be met by heavy investment in public transportation and the replacement of roads with bike paths. A good example of a city that has taken this idea to heart is Oslo, which plans to ban all cars from the city center by 2019 – approximately six years before a nationwide city ban comes into effect. Oslo is planning to replace almost 50 kilometers of road with bike lanes by the time the city goes car-free.

²On the one hand, banning cars seems like a simple way to address congestion in city centers. Yet, on the other hand, serious investment is required to make this feasible. One issue is that extensive public transportation networks would be required to replace cars in city centers. Many networks are seriously outdated or limited in their coverage. Furthermore, many countries simply do not have the financial means to build and extend their networks on such a scale.

³I believe that banning cars from city centers is only feasible in cities that already have an effective public transportation system. For everywhere else, cars are simply the most efficient way to get around.

⁴To conclude, while many cities are making steps toward banning cars from city centers, doing so requires heavy investment which many countries may not be able to afford. Realistically, we are a long way from car-free city centers.

D Match the paragraphs (1–4) to their functions (a–d).

- | | | | |
|--------------------|---|---------------------|---|
| a Arguments for | 1 | c Conclusion | 4 |
| b Personal opinion | 3 | d Arguments against | 2 |

E Complete the box with phrases from the blog.

Structuring a for and against blog post

Introduction
Many people think that ...
1 ... *some people think that ...*

To give arguments for and against
Some people argue that ...
Others think ...
2 *One of the arguments in favor ...*
3 *On the one hand ...*
4 *Yet, on the other hand, ...*

To give examples / more information
For example ...
5 *A good example of this ...*

To give your opinion
I am convinced that ...
6 *I believe that ...*

Conclusion
In conclusion, ...
7 *To conclude ...*

WRITING

A PREPARE Read the blog topic and write notes of arguments for and against.

Building more bicycle lanes is the best way to address pollution in city centers.

B PLAN Organize your notes from Exercise A into a plan for a for and against blog post.

C WRITE Write your blog post. Use your notes to help you.

D EDIT Work in pairs. Edit your partner's blog. Check:

- spelling and punctuation
- use of phrases to structure their argument
- strength of ideas

Refer students to this blog post as a model for the writing task.

Refer students to this checklist when editing their partner's work.



LEAD-IN

Ask students to make a list of the top three problems in their town or city. Then, put them into groups to discuss each issue and possible solutions. Monitor, encouraging students to use examples to help explain their ideas.

WRITING

A Give students time to read the introduction and answer the question. Give feedback as a class.

B Write the headings *For* and *Against* on the board, then elicit one or two arguments for each. Then, put students into pairs to think of more arguments. Give feedback as a class, building up the lists on the board.

C Give students time to read the full blog post to see if any of their ideas were mentioned.

D Read through the functions as a class, then give students time to match them to the paragraphs. Give feedback as a class.

E Give students time to scan the blog post again to find more examples for this section. Give feedback as a class.

WRITING TASK

A–B Add the blog topic to the board and elicit one or two arguments for and against it, mirroring the process you followed at the start of the lesson. Then, give students time to think of more arguments alone. Next, ask students to organize their notes into the following structure – introduction, arguments for, arguments against, conclusion.

C Tell students to write their blogs. Monitor and provide support with structure and vocabulary when necessary.

D Put students into pairs to edit each other's articles. Encourage students to give each other positive feedback. Students can then rewrite their articles either in class or for homework.

VOCABULARY

A Choose the correct prepositions to complete the sentences.

- I want to take a course in / on / for accounting next year.
- There's a risk with / of / for the company going out of business before the end of the year.
- Do you have any knowledge of / in / on spreadsheets?
- Congratulations about / for / on the birth of your new baby daughter!
- There are a lot of historic places of interest at / in / on the northern part of the country.
- Is there any possibility for / of / about getting a refund?

B Complete the sentences with words from the box.

balance benefit challenge
control influence produce

- We are being expected to produce far more than is humanly possible!
 - I'm so exhausted all the time. I think I just need a better work-life balance.
 - Always challenging yourself to try something new is extremely important.
 - The trend toward digital has influenced the new direction of the company.
 - If this deal goes through, XKOM will control 65% of the market.
 - One of the benefits of exercise is that it lowers your stress levels.
- C** Choose the correct options (a, b or c) to complete the sentences.

- He usually exaggerates so I'm not sure I believe him.
a entirely **b** firmly **c** widely
- They've improved the new model.
a entirely **b** incredibly **c** significantly
- Everyone survived the plane crash.
a Undoubtedly **b** Incredibly **c** Widely
- The price of tickets may vary between distributors.
a firmly **b** greatly **c** especially
- I believe that closing the company was the right decision to make.
a firmly **b** widely **c** significantly
- New England is usually pretty cold, in the winter.
a greatly **b** incredibly **c** especially
- The population will continue to rise as more people move there for work.
a incredibly **b** undoubtedly **c** firmly
- It is believed that AI will place many jobs at risk.
a widely **b** especially **c** entirely

GRAMMAR

A Complete the article with *will*, *going to* or the present progressive form of the verbs in parentheses. Sometimes more than one answer is possible.

Four changes to make to your life

At the start of every year, we all make promises to change certain aspects of our life.

'I ¹ 'm/am going to exercise (exercise) more and 'I ² 'm/am going to eat (eat) more healthily' we say. But we typically fail to keep our promises. So what simple changes can we make that will make a big difference and be easy to achieve?

- Get up and go to sleep at the same time. You ³ 'll/will feel (feel) a lot more refreshed.
- Be punctual. It reduces stress. If you start arriving early for things, you ⁴ 'll/will find (find) that life starts to feel less frantic.
- Routine is good, but you should also be spontaneous occasionally. When a friend says, 'I ⁵ 'm/am going to (go) the beach this weekend, do you want to come?' Say, 'Great! I ⁶ 'll/will come (come).'
- Try to be optimistic. For example, if your company is struggling, don't think 'I ⁷ 'm/am going to lose (lose) my job.' Be positive and think about the new good job you might get.

Make these simple changes in your life and I am sure you ⁸ 'll/will be (be) happier in the long run.

B Choose the correct options to complete the sentences.

- Can we meet later? I 'll be watching / 'll have watched the World Cup final then.
- At the end of this month, I 'll be working / 'll have been working at this company for 20 years!
- Just think – this time next week, we 'll be lying / 'll have been lying on a beach in Hawaii.
- I can't believe she's changing jobs again. She 'll have had / 'll be having three different jobs this year!
- I won't be finishing / won't have finished this work by the deadline. I just don't have enough time.
- Will you be going / Will you have gone to Sarah's party on Saturday?
- In three years, I 'll have completed / 'll be completing college and I'll be starting to look for work.
- This is ridiculous! In ten minutes time I 'll have been waiting / 'll be waiting for almost two hours!