

9 Global warming

Verbs for natural processes | Verbs and adjectives associated with scientific study |
Nouns associated with climate | Recognizing antonyms

Vocabulary

Natural processes:

- **condense (condenses, condensing, condensed)**
VERB When a gas or vapour **condenses**, or **is condensed**, it changes into a liquid.
▪ [+ to-inf] *Water vapour condenses to form clouds.* ▪ [+ into] *The compressed gas is cooled and condenses into a liquid.* ▪ [+ out of] *As the air rises it becomes colder and moisture condenses out of it.*
- **contract (contracts, contracting, contracted)**
VERB When something **contracts** or when something **contracts** it, it becomes smaller or shorter. ▪ *Blood is only expelled from the heart when it contracts.* ▪ *New research shows that an excess of meat and salt can contract muscles.*
- **expand (expands, expanding, expanded)**
VERB If something **expands** or **is expanded**, it becomes larger. ▪ *Engineers noticed that the pipes were not expanding as expected.* ▪ *The money supply expanded by 14.6 per cent in the year to September.* ▪ [V-ing] *a rapidly expanding universe*
- **flow (flows, flowing, flowed)**
VERB If a liquid, gas, or electrical current **flows** somewhere, it moves there steadily and continuously. ▪ [+ into] *A stream flowed into the valley.* ▪ [+ into] *The current flows into electric motors that drive the wheels.*

Verbs associated with scientific study:

- **estimate (estimates, estimating, estimated) (also overestimate, underestimate)**
VERB If you **estimate** a quantity or value, you make an approximate judgment or

calculation of it. ▪ [+ that] *The Academy of Sciences currently estimates that there are approximately one million plant varieties in the world.* ▪ *He estimated the speed of the winds from the degree of damage.*

- **predict (predicts, predicting, predicted)**
VERB If you **predict** an event, you say that it will happen. ▪ *Chinese seismologists have predicted earthquakes this year in Western China.* ▪ [+ that] *Some analysts were predicting that online sales during the holiday season could top \$10 billion.* ▪ [+ when] *tests that accurately predict when you are most fertile*
- **state (states, stating, stated)**
VERB If you **state** something, you say or write it in a formal or definite way. ▪ *The table clearly states the amount of fat found in commonly used foods.* ▪ [+ that] *The police report stated that he was arrested for allegedly assaulting his wife.* ▪ *Buyers who do not apply within the stated period can lose their deposits.*

Adjectives:

- **accurate (opposite inaccurate)**
ADJECTIVE **Accurate** information, measurements, and statistics are correct to a very detailed level. An **accurate** instrument is able to give you information of this kind. ▪ *Accurate diagnosis is needed to guide appropriate treatment strategies.* ▪ *a quick and accurate way of monitoring the amount of carbon dioxide in the air*
- **likely (opposite unlikely)**
ADJECTIVE You use **likely** to indicate that something is probably the case or will probably happen in a particular situation.

- *Experts say a 'yes' vote is still the likely outcome.* ▪ [+ that] *If this is your first baby, it's far more likely that you'll get to the hospital too early.*

Nouns associated with climate:

- **current (currents)**

1 NOUN A **current** is a steady and continuous flowing movement of some of the water in a river, lake, or sea. ▪ [+ of] *The ocean currents of the tropical Pacific travel from east to west.* ▪ *The couple were swept away by the strong current.*

2 NOUN A **current** is a steady flowing movement of air. ▪ [+ of] *a current of cool air* ▪ *The spores are very light and can be wafted by the slightest air current.*

- **drought (droughts)**

NOUN A **drought** is a long period of time during which no rain falls. ▪ *Drought and famines have killed up to two million people here.*

- **flood (floods)**

NOUN If there is a **flood**, a large amount of water covers an area which is usually dry, for

example when a river flows over its banks or a pipe bursts. ▪ *More than 70 people were killed in the floods, caused when a dam burst.* ▪ *Floods hit Bihar state, killing 250 people.*

- **glacier (glaciers)**

NOUN A **glacier** is an extremely large mass of ice which moves very slowly, often down a mountain valley. ▪ *University of Alaska scientists report that the state's glaciers are melting faster than expected.* ▪ *Twenty thousand years ago, the last great ice age buried the northern half of Europe under a massive glacier.*

- **hurricane (hurricanes)**

NOUN A **hurricane** is an extremely violent wind or storm. ▪ *In September 1813, a major hurricane destroyed US gunboats and ships that were defending St Mary's, Georgia, from the British.* ▪ *Around eight hurricanes are predicted to strike America this year.*

- **typhoon (typhoons)**

NOUN A **typhoon** is a very violent tropical storm. ▪ *large atmospheric disturbances such as typhoons* ▪ *a powerful typhoon that killed at least 32 people*

Practice exercises

1 Complete each sentence 1–6 with an appropriate word.

- 1 This mountain range was formed by _ l _ _ _ _ _ s millions of years ago.
- 2 Tropical storms and _ y _ _ _ _ _ s are common in the South Pacific at this time of year.
- 3 The Horn of Africa has been afflicted with severe _ _ _ _ _ g _ _ _ s for many years.
- 4 You need to be careful when swimming in these waters as there's a very strong _ _ r _ _ _ t.
- 5 The cost of repairing properties damaged by the _ l _ _ _ _ ran into billions of pounds.
- 6 We've been advised to board up the windows and stay indoors as the _ u r _ _ _ _ _ is approaching fast.

2 Read the questions 1–4 about the words in Exercise 1. Then listen to Track 14 to find answers.

- 1 Is a hurricane more likely to cause a flood or a drought?
- 2 What is the difference between a hurricane and a typhoon?
- 3 Where might you find a glacier?
- 4 Where might you feel a current: in the air, in the water, in both air and water?



14

Exam tip: The prefixes *un-*, *in-*, *il-*, *ir-* and *dis-* are commonly used to make words negative.

Examples: *necessary* – *unnecessary*, *accurate* – *inaccurate*

Learning to recognize negative prefixes can help you work out the meaning of words.

3 Make words 1–5 negative by adding a prefix.

- | | | | |
|---|------------|---|-------------|
| 1 | agree | 4 | legal |
| 2 | consistent | 5 | responsible |
| 3 | likely | | |

Exam tip: The word pairs above are antonyms (words with opposite meanings).

Other prefixes that are commonly used to form antonyms include:

prefix	meaning	example		prefix	meaning	example
col-	coming	<i>collect</i>				
com-	together	<i>combine</i>	vs.	ex-	moving apart or outwards	<i>exclude</i>
con-		<i>connect</i>				<i>expel</i>
over-	too much	<i>overstate</i>	vs.	under-	too little	<i>understate</i>
pre-	before	<i>pre-industrial</i>	vs.	post-	after	<i>post-industrial</i>

Knowing the meaning of these prefixes can help you work out the meaning of unfamiliar words and their opposites.

4 Match the prefixes 1–4 with the word roots a–d.

- | | | | |
|---|-------|---|------------------|
| 1 | con- | a | -pand |
| 2 | ex- | b | -estimate, -flow |
| 3 | pre- | c | -dense, -tract |
| 4 | over- | d | -historic |

5 Choose words from exercises 3 and 4 to complete sentences 1–7. Make any necessary changes to verb forms.

- 1 Water vapour _____ to form clouds.
- 2 When water turns into ice, it _____.
- 3 In _____ times, people endured ice ages, that is prolonged periods of intense cold.
- 4 During the flooding, rivers and streams _____ their banks in countless places.
- 5 Climate scientists came to different conclusions because the data was _____.
- 6 Global warming is _____ to slow down in the near future.
- 7 Politicians _____ over how to deal with climate change.