

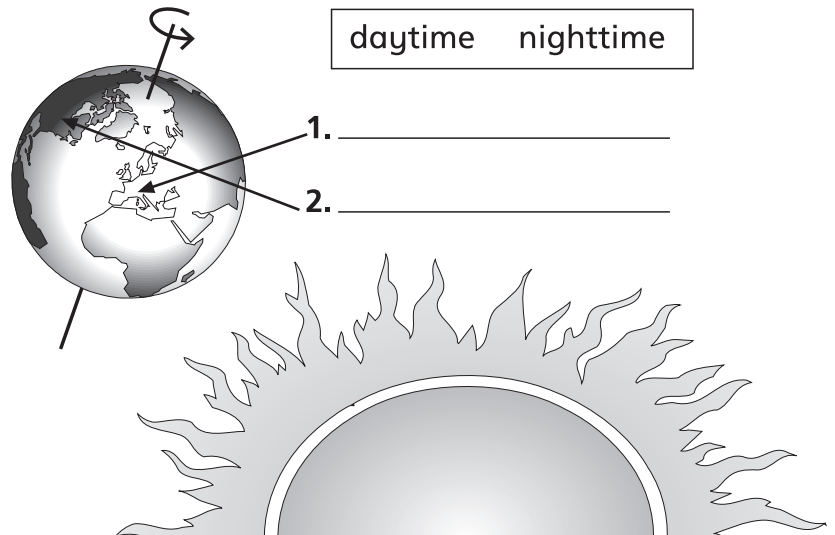
The Earth. Rotation and Revolution.

The Earth has two movements: rotation and revolution. **Rotation** is the movement of the Earth on its axis. **Revolution** is the movement of the Earth around the Sun.

1 Label.

Daytime and nighttime

The Earth rotates on its axis. This movement is called rotation. The Earth takes 24 hours to rotate completely. In the half of the Earth that faces the Sun it is daytime. In the other half it is nighttime.

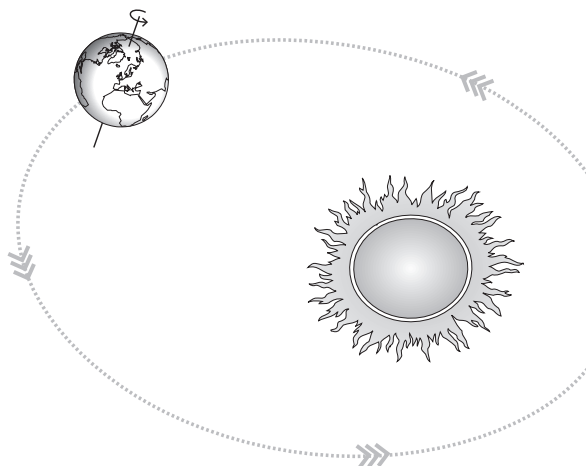


2 Write.

summer	short	June
365	March	long

The Four Seasons

The Earth orbits the Sun. This movement is called revolution. The Earth takes (1) \_\_\_\_\_ days and six hours to orbit the Sun. The Earth's axis is at an angle and this gives us the four seasons: spring, (2) \_\_\_\_\_, autumn and winter. In the northern hemisphere summer starts on 21st (3) \_\_\_\_\_ and finishes on 22nd September. In summer the days are very (4) \_\_\_\_\_. When it is summer in the northern hemisphere it is winter in the southern hemisphere.



Winter starts on 21st December and finishes on 20th (5) \_\_\_\_\_. In winter the days are (6) \_\_\_\_\_. When it is winter in the northern hemisphere it is summer in the southern hemisphere.

3 True or false?

- 1 The Earth takes 365 days and 6 hours to rotate on its axis. \_\_\_\_\_
- 2 When it is daytime in Spain, it is nighttime in some other countries. \_\_\_\_\_
- 3 Rotation and revolution are the two movements of the Earth. \_\_\_\_\_
- 4 Spain is in the northern hemisphere. \_\_\_\_\_
- 5 In the northern hemisphere the days are short in summer. \_\_\_\_\_



## The Earth. Rotation and revolution.



### Aim

- To study the movements of the Earth.

### Language focus

**Key vocabulary:** *rotation, revolution, daytime, nighttime, axis, season, spring, summer, autumn, winter, northern hemisphere, southern hemisphere, warm, hot, long, short.*

**Key language:** *The Earth takes 24 hours to rotate. Revolution is the movement of the Earth around the Sun. Summer begins on 21st June and finishes on 22nd September. In summer the days are very long.*

### Materials

- A globe.
- Worksheet.

questions like *What happens in the half of the Earth that faces the Sun? It is daytime. What happens in the other half? It is nighttime.* Explain that *the Earth rotates on its axis and that's why we have day and night. The Earth takes 24 hours to rotate completely.*

- If you have a globe put it near the window or a light. Show the pupils how while half of the globe gets the light the other half doesn't. Show them how when the Earth rotates on its axis the Sun shines on different parts of the planet.
- Read the text in Activity 1 with the class. The pupils write *daytime* and *nighttime* on the illustration.

**Answers:** 1-daytime; 2-nighttime

### Extension activity

If you have a globe, encourage the pupils to work out in which countries or continents it is daytime/nighttime at the moment. *When it is daytime in Britain it is nighttime in Japan.*

### Warm-up

- Write on the board *ermsun / wertni / aumntu / spingr*. Encourage the pupils to guess the words. Give them clues if necessary, eg, *the first letter is 's'*. Write the names of the four seasons on the board: *summer, winter, autumn* and *spring*. Talk about one of the seasons, eg, *In spring the trees have got flowers. In spring the weather is warm and sunny but it also rains.* Ask the children to write some sentences about the other seasons in their notebooks. Then elicit some sentences about each season from the class.
- Highlight the fact that in summer the days are longer and it's hotter. Ask the pupils if they know when the different seasons start and finish.

### Completing the Worksheet

#### Activity 1

- Ask a pupil to draw the Earth on the board. Invite another pupil to draw the Sun.
- Explain why we have day and night. Use a globe (or a ball). Ask the pupils some

#### Activity 2

- Ask the pupils questions about the Earth's orbit around the Sun and the four seasons, eg, *Does the Earth orbit the Sun? How long does the Earth take to orbit the Sun? Is it hot in summer? Are the days long in winter? When does spring begin?* etc.
- Read the six words in the box in Activity 2 with the class and explain their meaning if necessary. Encourage the pupils to read the text in pairs and write the words in the gaps in pencil.
- Read the text together with the class, explain the new words and encourage the pupils to call out the missing words. Check answers and get the pupils to correct any incorrect answers on their worksheets.

**Answers:** 1-365; 2-summer; 3-June; 4-long; 5-March; 6-short

## Extension activity

Ask the pupils to circle the ten most important words in Activities 1 and 2. Get feedback and write their words on the board.

Arrange the pupils in small groups. Encourage them to write sentences similar to those in the texts using the words on the board, eg, Summer: *Summer starts on 21st June.*

## Activity 3

- Say some true and false statements about the Earth and its movements. Encourage the pupils to say *true* or *false* as appropriate. If they say *false*, encourage them to correct the sentence, eg, *The Earth takes 24 hours to orbit the Sun.* (F) *The Earth takes 365 days (and six hours) to orbit the Sun.* In the northern hemisphere the days are long in summer. (T)
- Ask the pupils to do Activity 3.

**Answers:** 1-F (It takes 24 hours); 2-T; 3-T; 4-T; 5-F (In the northern hemisphere the days are long in summer).