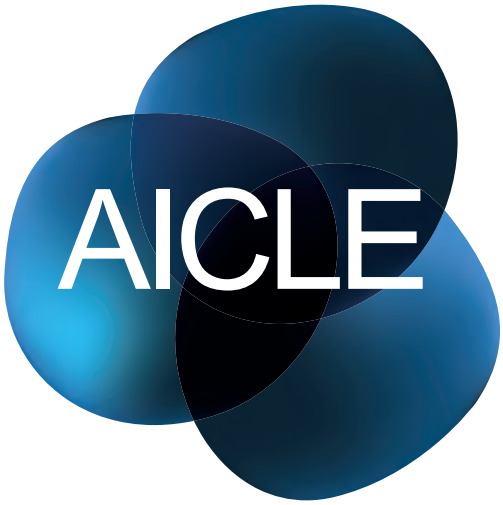
Conocimiento del medio natural, social y cultural

Primaria

JUNTA DE ANDALUCIA

Inglés



JUNTA DE ANDALUCIA

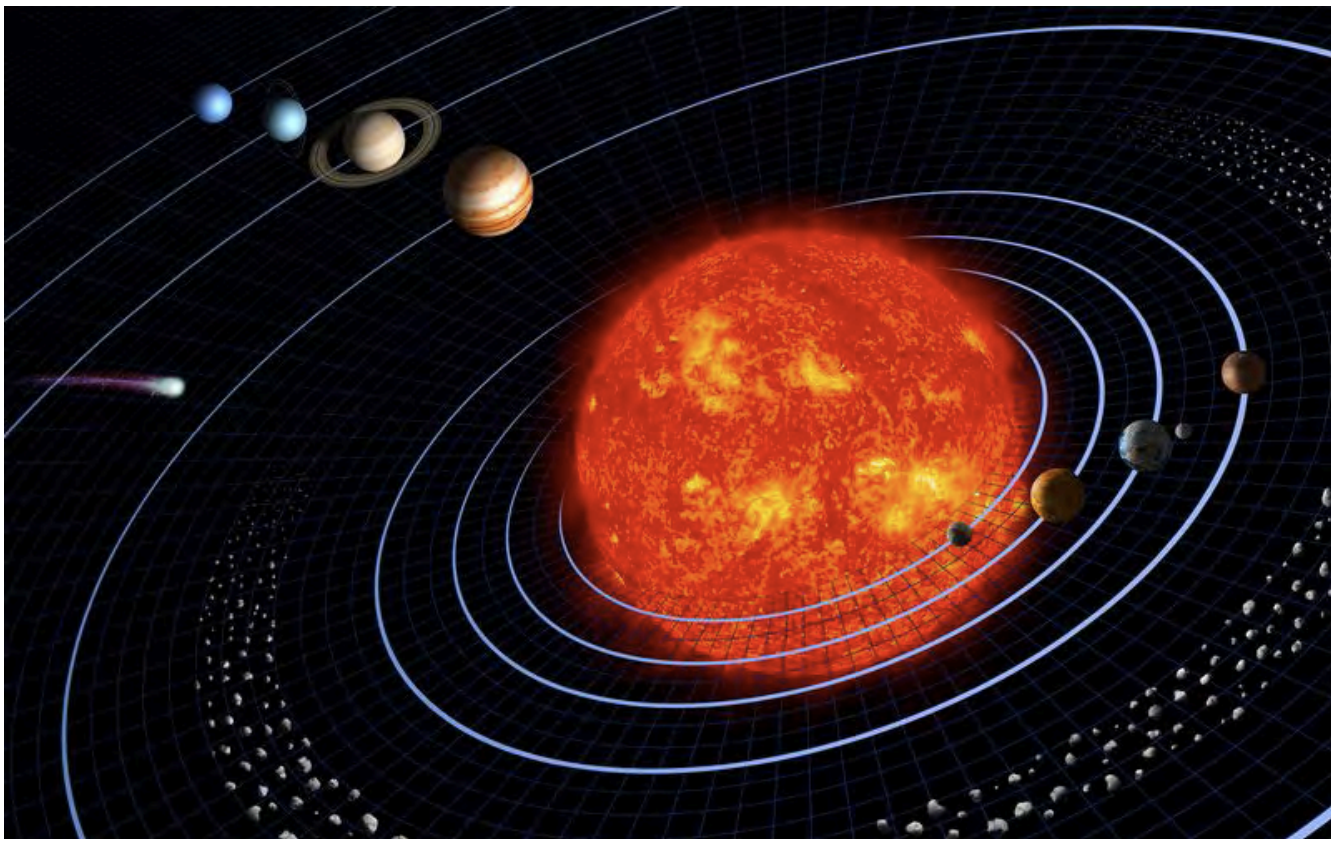
Identificación del material AICLE

TÍTULO	The Solar System
NIVEL LINGÜÍSTICO SEGÚN MCER	A1.3
IDIOMA	Inglés
ÁREA / MATERIA	Conocimiento del Medio Natural, Social y Cultural
NÚCLEO TEMÁTICO	El universo y la astronomía
GUIÓN TEMÁTICO	Esta secuencia didáctica trabajará el sistema solar, los planetas, la luna, los asteroides, meteoritos, cometas, las fases lunares, la causa de los días y las noches y la causa de las estaciones del año.
FORMATO	PDF
CORRESPONDENCIA CURRICULAR	5º de Educación Primaria
AUTORÍA	Eufemia Rosso Delgado
TEMPORALIZACIÓN APROXIMADA	De 8 a 10 sesiones
COMPETENCIAS BÁSICAS	Conocimiento e interacción con el mundo físico: conocer los astros del sistema solar y la ubicación de la Tierra, de la Luna y del resto de los planetas. Comunicación lingüística: ampliar y repasar el vocabulario relacionado con la astronomía. Ejercitar una lectura comprensiva de textos relacionados con el núcleo temático. Social y ciudadana: reconocer la importancia del conocimiento científico del universo. Tratamiento de la información y competencia digital: recoger y utilizar la información procedente de algunas páginas web para crear un móvil de la Tierra, la Luna y el Sol. Desarrollar el hábito de obtener información de fuentes diversas, tanto sobre astronomía como sobre otras materias: libros, enciclopedias, y páginas web. Aprender a aprender: organizar la información sobre el universo, el sistema solar y la Tierra en esquemas y mapas conceptuales. Autonomía e iniciativa personal y competencia emocional: adquirir interés y gusto personal por la observación de los astros y de los fenómenos astronómicos. Añadir nuevos elementos en la unidad a los ya ofrecidos por el profesorado en diferentes actividades.
OBSERVACIONES	Todas las imágenes utilizadas en la unidad están bajo la licencia “Creative commons”. Algunas de ellas han sido modificadas.

Tabla de programación AICLE

OBJETIVOS	- Desarrollar la curiosidad por conocer el Sistema Solar - Conocer los diferentes astros del cielo diurno y nocturno - Conocer la composición del universo: galaxias, estrellas y constelaciones, planetas, satélites, asteroides y cometas - Conocer las características básicas de los diferentes astros - Identificar los planetas del Sistema Solar - Describir los movimientos que la Tierra realiza - Identificar las diferentes fases de la luna - Favorecer el desarrollo de técnicas para memorizar, organizar y relacionar los contenidos de la unidad
CONTENIDOS DE CURSO / CICLO	- La Tierra y sus movimientos - La luna y sus fases - El universo: galaxias, estrellas, planetas y satélites - El sistema solar: Sol, planetas, satélites, cometas, asteroides, meteoritos y estrellas fugaces
TEMA	La Tierra, la Luna, el sistema solar, planetas, satélites, cometas, asteroides, estrellas, constelaciones, nebulosas y galaxias.
MODELOS DISCURSIVOS	- Describir nuestro planeta - Explicar los movimientos que realiza la Tierra - Comparar las características de la luna, el sol y la Tierra - Describir las fases de la luna - Formular comparaciones entre las fases de la luna y diferentes letras - Definir los diferentes astros que podemos encontrar en el cielo - Comparar astros. - Describir los planetas - Informar sobre las características de los planetas
TAREAS	- Esquemas - Tablas - Mapas conceptuales - Párrafos estructurados - Doble puzzle - Entrada en cuaderno de campo - Hoja de observación de astros - Maquetas
CONTENIDOS LINGÜÍSTICOS	FUNCIONES: - Predecir el tema de estudio usando imágenes - Expresar características de los diferentes astros - Comparar características de las estaciones y tamaños de los astros - Reformular frases - Describir apariencia - Expresar posesión - Transformar tiempos verbales según la situación comunicativa ESTRUCTURAS: - Have – has - Rotate - rotates - Revolve – revolves - Hotter – colder - Hottest – coldest - Closest – furthest LÉXICO: Vocabulario relacionado con la Tierra: rotation, orbit, planet, sphere, axis, poles, hemispheres, equator, cardinal points. The seasons.
CRITERIOS DE EVALUACIÓN	- Conoce las características de la Tierra e identifica sus movimientos - Nombra las fases de la Luna - Define y conoce los diferentes astros que forman el Sistema Solar - Identifica en imágenes los planetas del Sistema Solar - Desarrolla técnicas para organizar la información - Desarrolla una actitud positiva hacia el uso de la L2 - Es capaz de autoevaluarse de forma consecuente con el trabajo realizado

THE SOLAR SYSTEM AND THE UNIVERSE



Activity 1. Look and classify the pictures

Let's look at some pictures.

What do you see? Are they planets or are they stars? Perhaps they are satellites .... Let's try to classify them into three columns. You should stand up, come to the blackboard, choose one flashcard and put it in one of the columns.

CELESTIAL BODIES	PLANETS	SPACE THINGS

This is a planet.

I think it´s a star.


Mercury

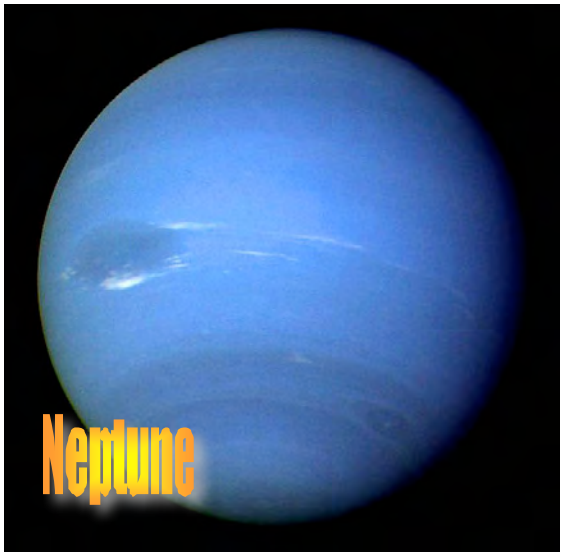

Venus


Earth


Mars

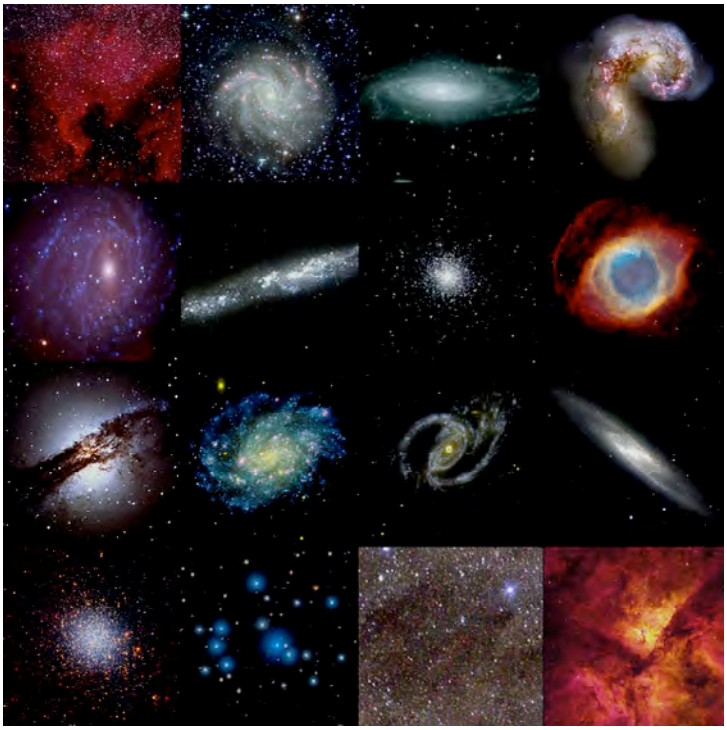

Jupiter


Saturn



Asteroid

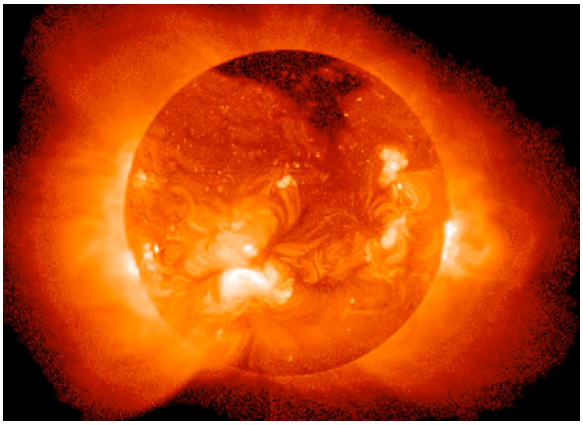
Comet



Galaxies

Moon

Rocket



Sun

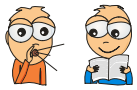
Satellite

Activity 2. KWL CHART

Now we are going to complete a KWL chart and we will also display another one in the class. In the first column, write anything you know about the Solar System, in the second column what you want to know and the third one, we will finish at the end of the unit.

WHAT DO I KNOW?	WHAT DO I WANT TO KNOW?	WHAT DID I LEARN?

Activity 3. Circle the words, cut out the sentences and stick them in groups



We are going to work in groups of three. One pupil is going to be the Moon, another pupil will be the Sun and the other, the Earth. Read the following sentences:

1. The Sun gives us light and heat.
2. The Moon is a satellite.
3. The Moon goes round the Earth.
4. The Earth rotates on its axis.
5. The Sun is a star.
6. The Earth revolves around the Sun.
7. The Sun always sets in the west.
8. The Earth is flat at the poles.
9. The Moon does not shine.
10. The Sun always rises in the east.
11. The Moon has four phases.
12. The Sun is in the middle of the Solar System.
13. The Earth is a planet.
14. It takes one year and six hours for the Earth to complete its orbit.
15. The Moon takes approximately 28 days to orbit the Earth.

1. "Suns" should circle the word "Sun" in yellow, "Moons" should circle the word "Moon" in grey and "Earths" should circle the word "Earth" in blue.

2. Cut the sentences into strips and classify them into three groups: The Sun, the Moon and the Earth.

3. Draw pictures of your sentences to show the key information.

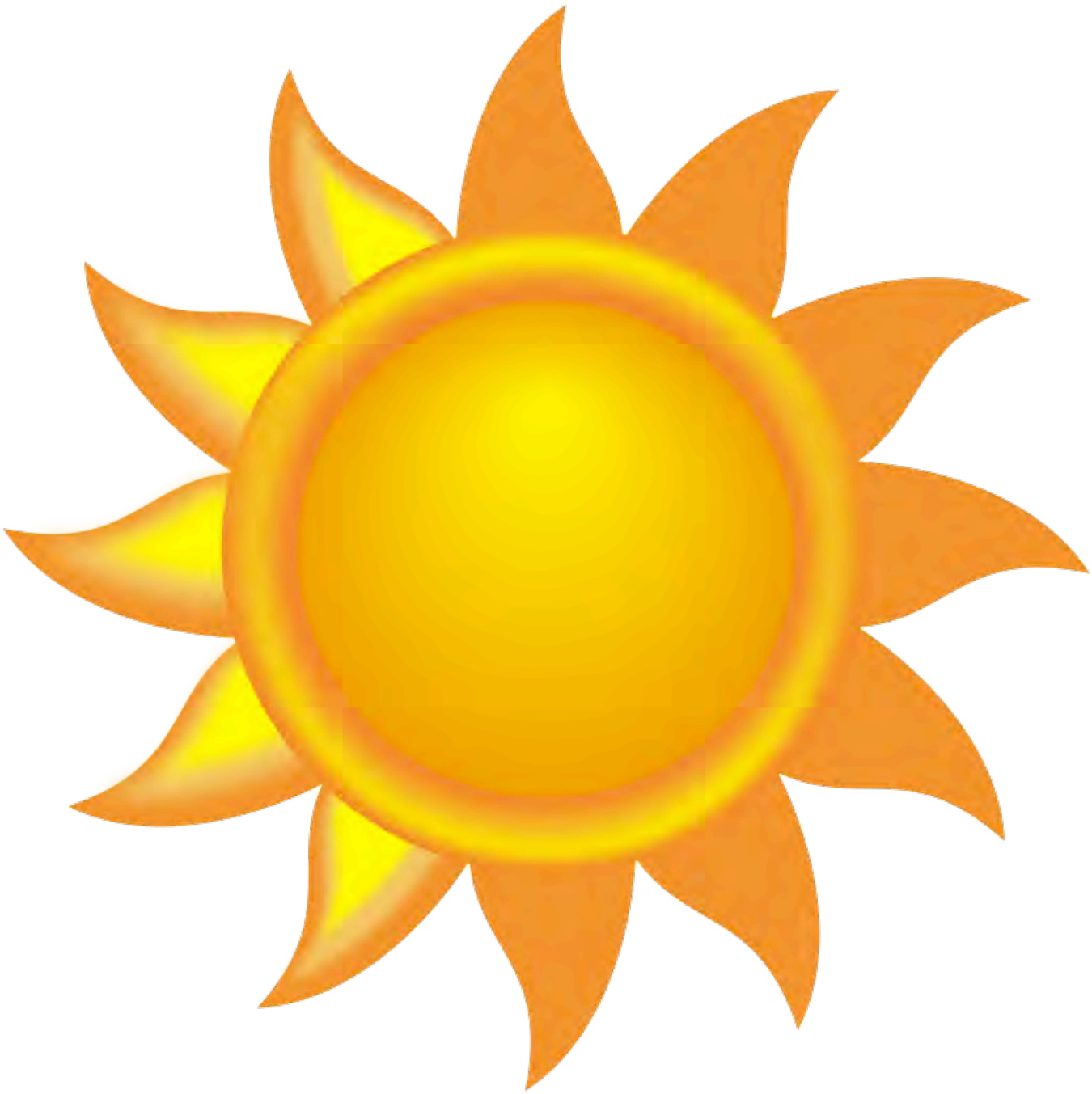
4. Then, stick the sentences and your pictures on the correct piece of paper with the corresponding image of the Sun, the Moon or the Earth.

5. Now, let's read the sentences. All "the Suns" will read a sentence. Then, children who are the Earth will read their sentences and the children who are the Moon will read their sentences. Act out your sentence.

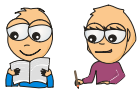
6. Let's hang all the "Suns", "Moons" and "Earths" on a clothes line.

MAIN VOCABULARY

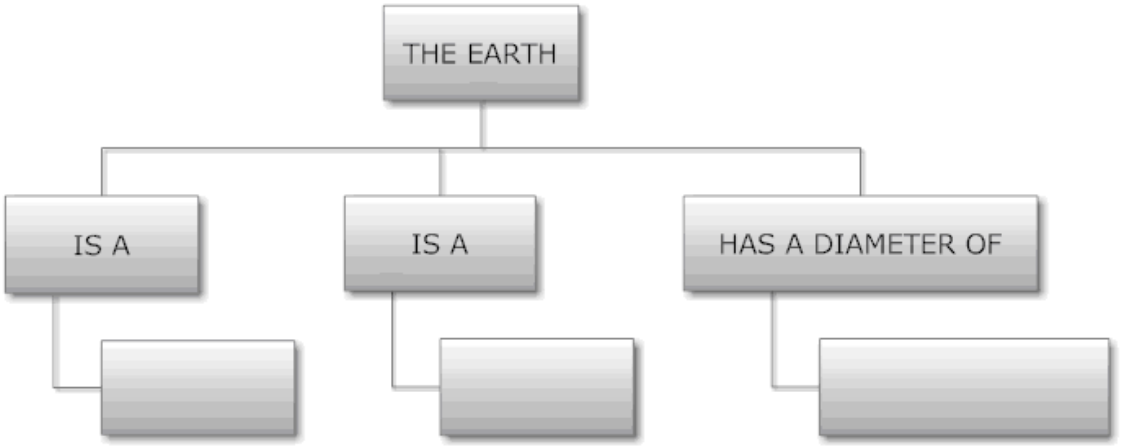
Light: illumination, energy from the Sun, brightness.
Heat: high temperature.
To go round: revolve, rotate
To revolve: rotate
To set: go down, below the horizon.
To rise: move upwards
To shine: emit light

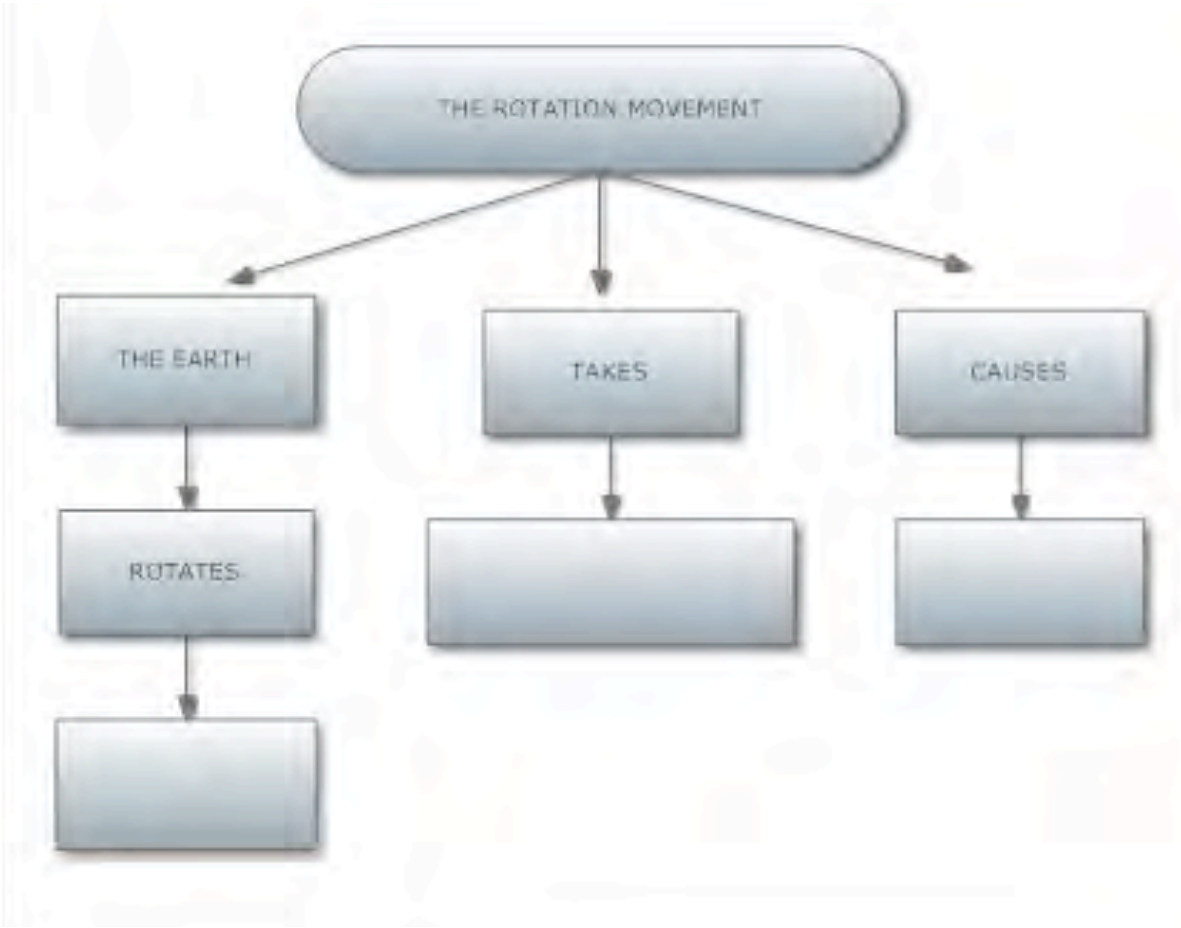


Activity 4. Read and complete the chart



Read the following text and complete the charts.

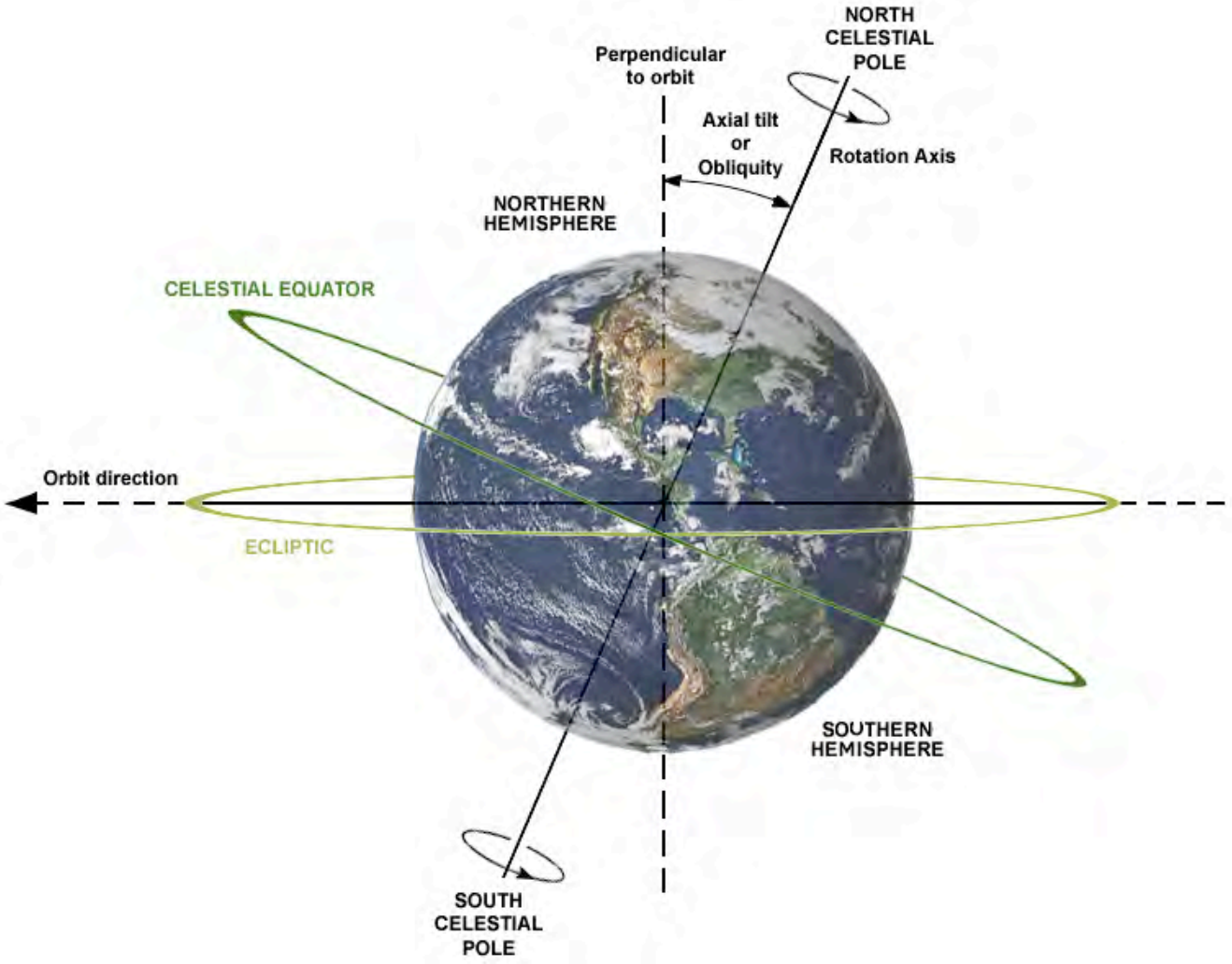




THE EARTH

The Earth is our planet. It is a sphere that has a diameter of about 12,700 kilometers. It is flat at the poles. The Earth has poles, hemispheres and an equator.

The Earth has two movements: rotation and revolution. Today we are going to learn about rotation.

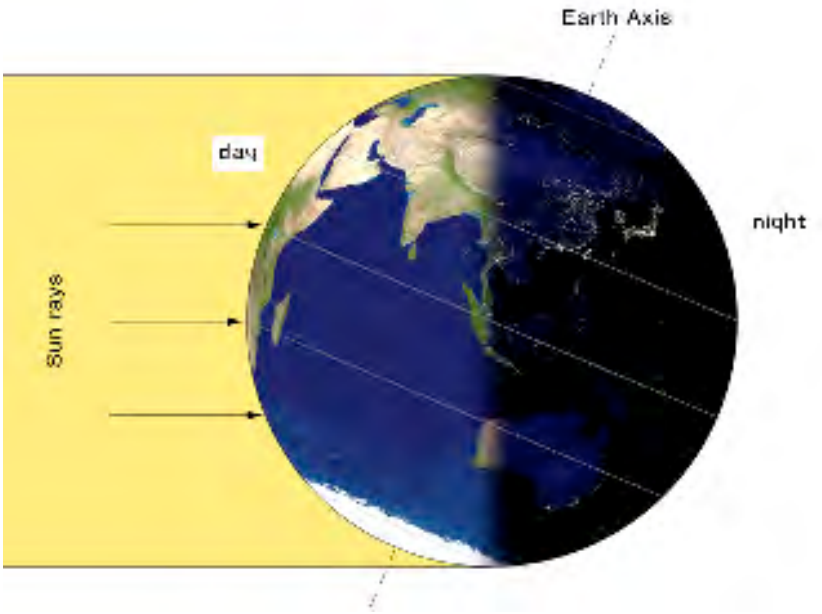


1. Rotation

The Earth rotates on its axis, which passes through both poles. It takes one day or twenty-four hours to complete one rotation. Rotation causes day and night.

The Earth rotates constantly in the same direction, that's why the Sun always rises in the east and sets in the west. Because the Earth is a sphere, one half is facing the Sun and the other half is facing away from the Sun.

It is day on the part of the Earth facing the Sun.
It is night on the part facing away from the Sun.



MAIN VOCABULARY

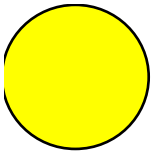
Poles: the two extremes of the Earth
Hemispheres: the Northern and Southern halves of the Earth
Equator: an imaginary line that divides the Earth into the Northern and Southern hemispheres
Rotation: revolving
Orbit: trajectory, circuit
To face: to look towards
To face away: not to look towards

Activity 5. Show the Earth's movement and draw day and night

Let's see how the Sun gives out light and how rotation causes day and night. We need a globe and a torch. One of you will take the globe and will make it rotate on its axis very slowly. Another one will use the torch as if it were the Sun. Who can explain the movement?

Now watch this picture and follow the following instructions:

- Use a yellow pencil to colour the part of the Earth where it is day.
- Use a grey pencil to shade the part of the Earth where it is night.



Why is it day/night in Europe/America/Asia/America/Oceania/Antarctic?

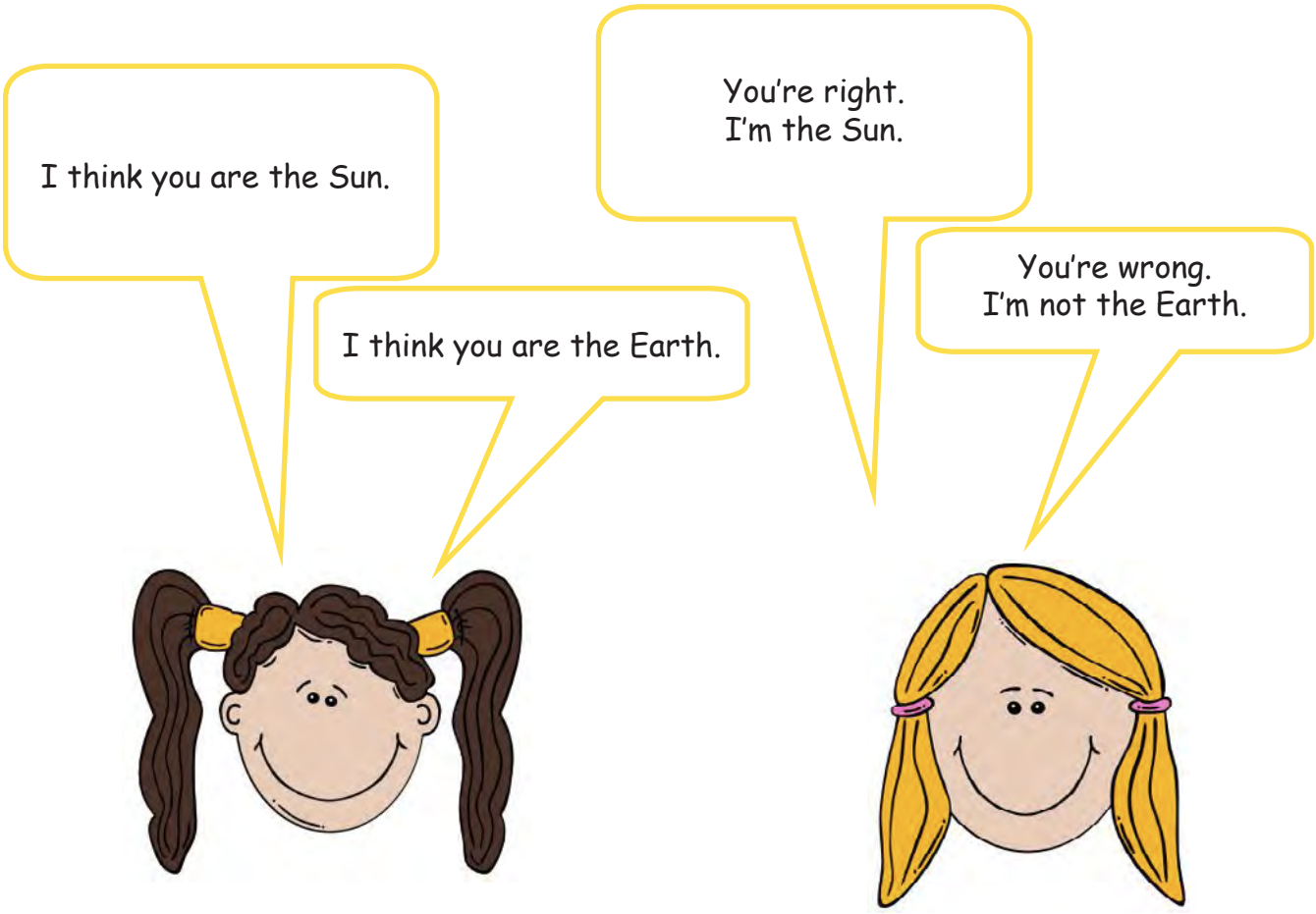
In	Europe Africa Asia America	it´s	day night	because they are	facing facing away from	the Sun

Activity 6. Speaking and role play 

Choose the Sun, the Earth or the Moon from the clothes line and describe it using the following language frame:

Who am I?

I am a	planet. star. satellite.		I	don't revolve revolve	around the	planets. the Sun.



Activity 7. Read, listen and complete the text in groups

You are going to work in groups of three. Read the following sentences, cut them into strips and then listen to your teacher and put them in order.

The Earth revolves around the Sun.

It is night on the part facing away from the Sun.

The Earth has poles, hemispheres and an equator.

It takes one year and six hours to complete one orbit.

The Earth rotates on its axis. It takes one day or twenty-four hours to complete one rotation.

The Earth's revolution causes the seasons.

Rotation causes day and night.

The Earth rotates constantly and in the same direction, that's why the Sun always rises in the east and sets in the west.

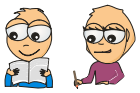
It is a sphere.

It is day on the part of the Earth facing the Sun.

The Earth has two movements: rotation and revolution.

The Earth is our planet.

This is the Earth's revolution.

Activity 8. Read and complete the chart 

Now complete the chart about rotation and revolution using the sentences you have just ordered.

MOVEMENTS OF THE EARTH	THE EARTH ROTATES / THE EARTH REVOLVES	IT TAKES	IT CAUSES

Activity 9. Interaction 

In pairs, practise the following questions using the chart you have just completed.

Student A: - How does the Earth move?
Student B: - How does the Earth move when it is rotating?
Student A: -How does the Earth move when it is revolving around the Sun?
Student B: - How much time does it take for the Earth to rotate one time?
Student A: -How much time does it take for the Earth to orbit the Sun one time?
Student B: - What does rotation cause?
Student A: -What does revolution cause?

Activity 10. Write a paragraph 

Use the chart and the questions in activities 8 and 9 to write an explanation about one of the Earth's movements. Then, explain it to your classmates.

One of the Earth's movements is _____

_____

_____

_____

_____

_____

_____

Activity 11. Read and complete the text in pairs

We are going to listen to a recording about the Earth's movements. While you listen, complete the following text in pairs using the words below.

Text for pupils:

The Earth is our _____. The Earth has two movements: _____ and _____. Revolution is when the Earth revolves around the _____.This process takes one year and six hours. Revolution causes the _____. There are four seasons: spring, _____, autumn and _____. In summer, it is _____ than the rest of the year. Days are _____ and nights are _____. In winter, it is _____ than the rest of the year. Days are shorter and nights are longer. _____ is the season between winter and summer and _____ is the season between summer and winter. In spring and autumn, days and nights are almost the same length.

Colder	Longer	Seasons	Summer
Shorter	Rotation	Sun	Spring
Revolution	Hotter	Autumn	Planet

Activity 12. Read this text and check the information you have just completed

Revolution

The Earth revolves around the Sun in orbit, at the same time that it rotates on its axis. It takes one year and six hours for the Earth to complete its orbit around the Sun. As a result, every four years we have an extra day in February. This year is called a leap year. The Earth's revolution causes the seasons.

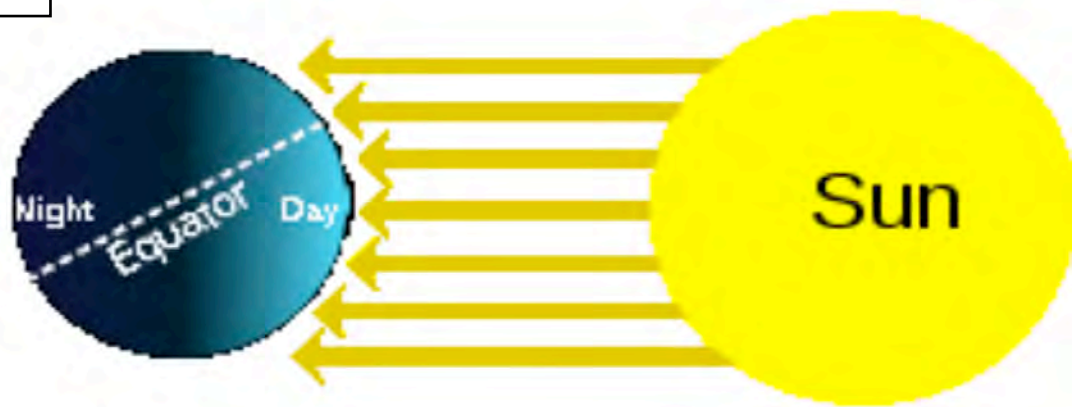
When a hemisphere is tilted towards the Sun, it is summer because it receives more light and heat.

In summer, it is hotter than the rest of the year. Days are longer and nights are shorter.

When a hemisphere is tilted away from the Sun, it is winter because it receives less light and heat.

In winter, it is colder than the rest of the year. Days are shorter and nights are longer.

WINTER



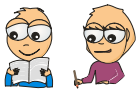
SUMMER

Spring is the season between winter and summer and autumn is the season between summer and winter. In spring and autumn, days and nights are almost the same length.

MAIN VOCABULARY

Leap year: a year when there are 29 days in February
To be tilted towards: to lean in one direction
Almost: nearly
Length: the time that it takes to complete an activity

Activity 13. True or false



Read these sentences and write T for true or F for false. Correct the false sentences.

- The Earth is not a sphere.

- The Earth has poles, hemispheres and an equator.

- The Earth has one movement called rotation.

- Rotation takes one year and six hours to complete.

- Revolution takes 24 hours to complete.

- It is day on the part of the Earth facing away from the Sun.

- Revolution causes the seasons and day and night.

- When a hemisphere is tilted towards the Sun, it is summer because it receives more light and heat.

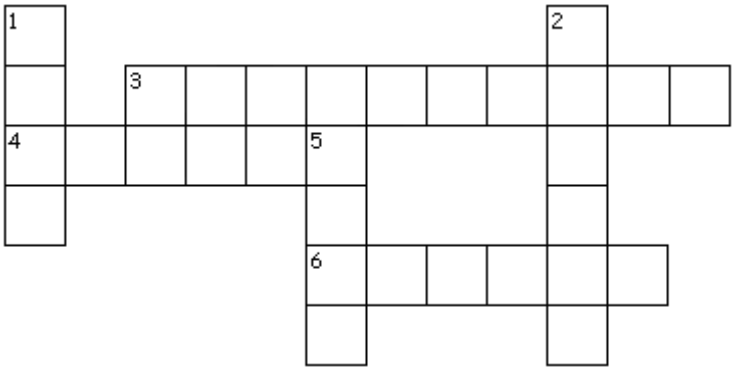
- In winter, it is colder than the rest of the year. Days are shorter and nights are longer.

- In spring and autumn, days and nights are almost the same length.

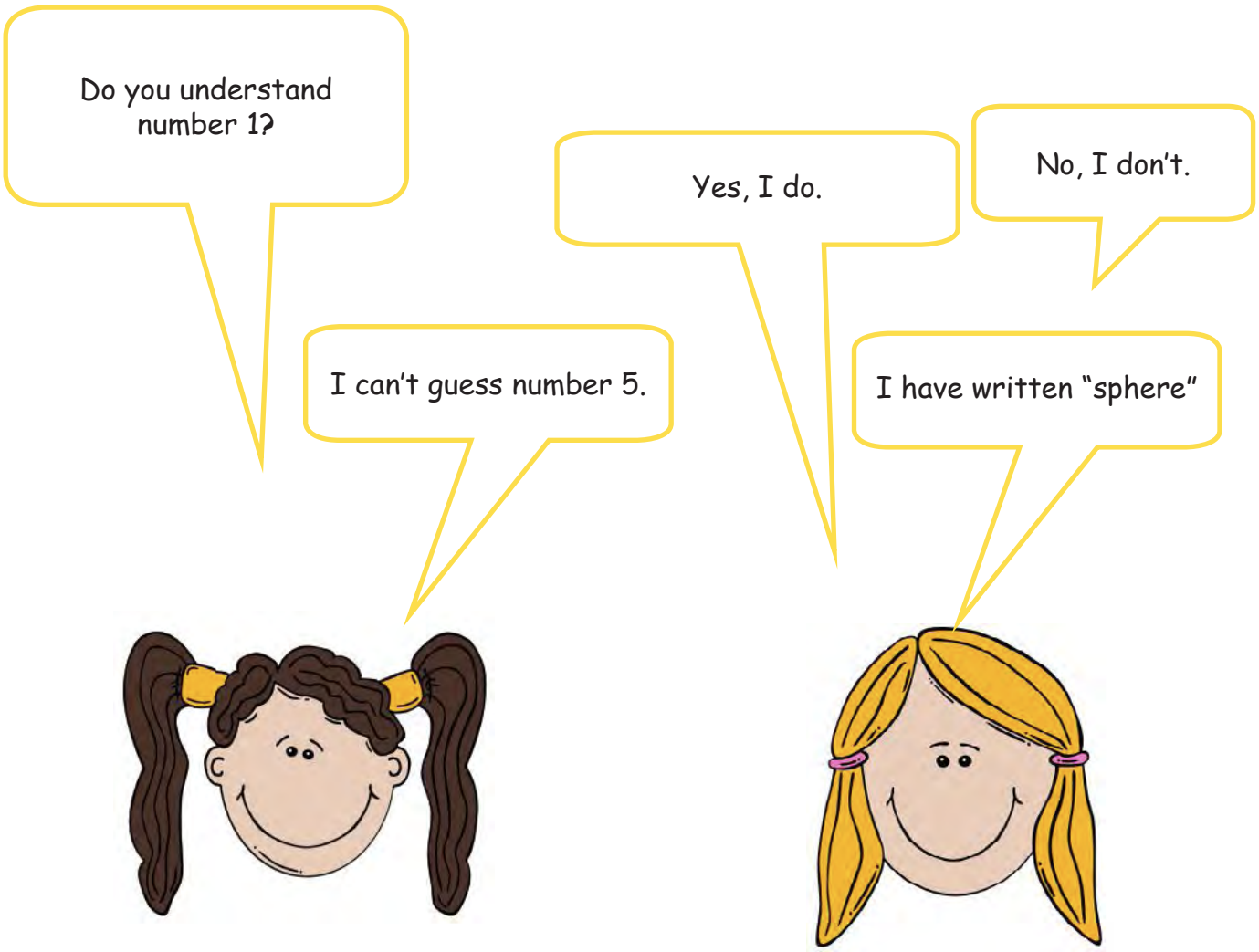
Activitiy 14. Crossword

Listen to the hints and complete the following crossword.

THE EARTH



After listening, check in pairs.



Activities 15. Wordsearch

In pairs, look for the following words in the wordsearch. Use the language in the box to interact with your classmate.

THE EARTH

A T I B R O P A Q E S S O B D

R O T A T I O N Q E V P Y A O

Q Q B D O G L U R Q G H Y P I

G X K T O G A E A Y A E T H E

T H G I N T H S Z X S R V K F

U Q M W O P G F N D I E C N W

T N L R S V B F P O R S P S J

D O G I P W C N F W S Q J N V

N W M Z U V S J D Q V A U X I

A E N A H G M F U Y K V E Z J

H C C P T W O G B J T N Q S Q

H D M H W D J A W V Q M Y K S

E D E R V X Z Z U S X Q X P Z

L K F N S K D I X D B M Y X S

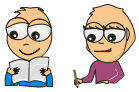
E G Z R W P Z T S E L O P Q T

AXIS
DAY
EQUATOR
HEMISPHERES
NIGHT
ORBIT
POLES
ROTATION
SEASONS
SPHERE

Did you find the word "axis"?
Where is "day"?
Do you see "hemispheres"?

Yes, I did / No, I didn't
It is next to "equator" / I don't know
Yes, I do / No, I don't

Activities 16 Double puzzle



THE EARTH

TOTIRNOA

1	2	25	16	5	22	7	21

SAUSEC

9	4	11	14	13	12

YDA

15	10	17

NAD

18	8	20

HINTG

19	6	23	24	3

1	2	3	4	5	6	7	8

9	10	11	12	13	14

15	16	17

18	19	20

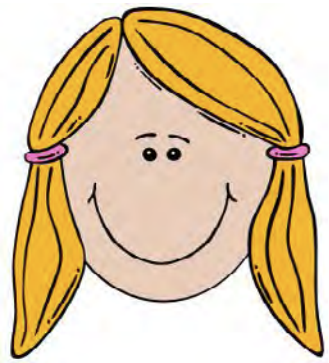
21	22	23	24	25

Do you know the first word?

Do you know the third word?

Yes, I do. The first word is "rotation".

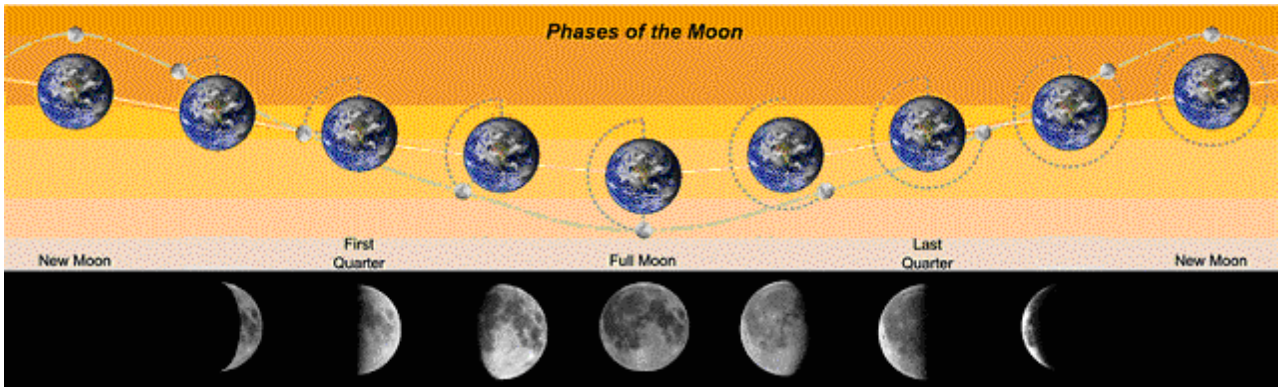
No, I don't.



Activity 17. Shapes of the Moon

Let's look at an image. Think about these questions.

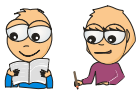
- Is the Moon always the same? Is its shape the same or does it have different shapes?
- Is the shape similar to a letter? The Moon can be like a C./ The Moon can be like a D. / The Moon can be like an O.



Try to make sentences about what you think about the Moon.

I think	the Moon can be like	a C (last quarter) a D (first quarter) an O (full moon)
	if you don't see the Moon	it's a new moon

When the Moon is like	a C a D an O	it's a it's in it's	last quarter first quarter full Moon
When I can't see the Moon		it's a	new moon

Activity 18. Read and complete the chart in pairs 

In pairs, read the following text about the Moon and its phases. While you read, complete the chart.

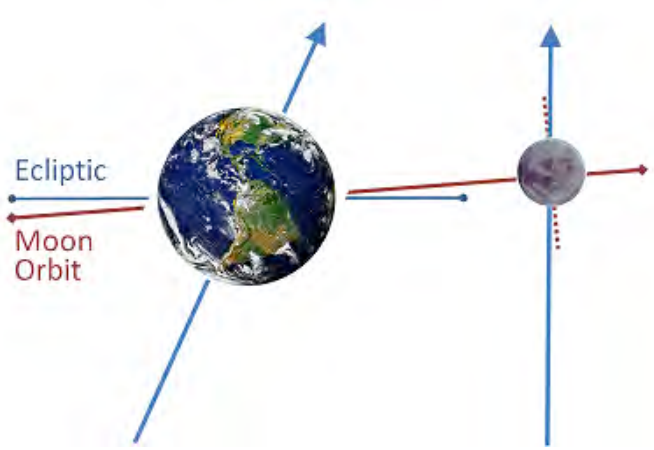
THE MOON					
is a	does not give out	is not a	reflects	rotates on	orbis the

THE PHASES OF THE MOON			
are			
Draw a picture	Draw a picture	Draw a picture	Draw a picture

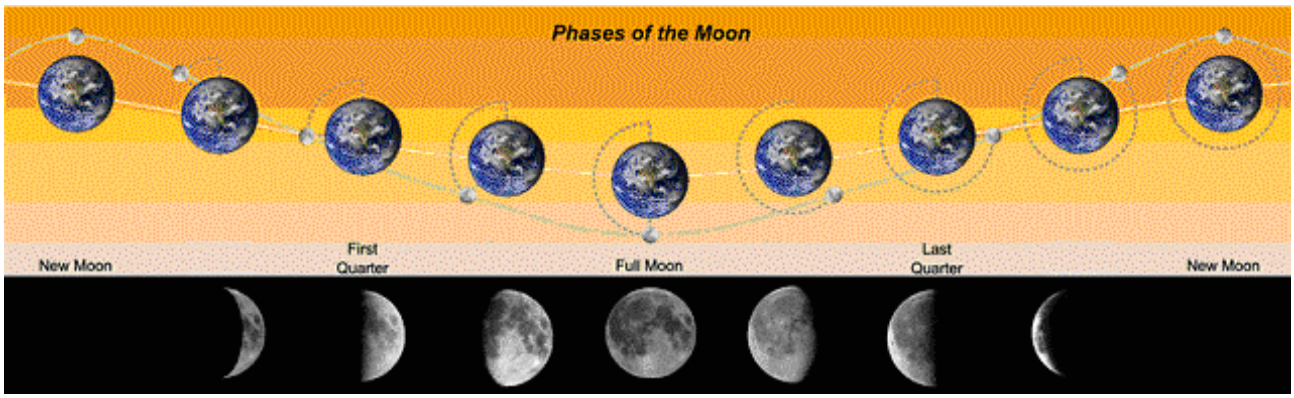
THE MOON

The Moon is the Earth's natural satellite. Life is not possible on the Moon because there is no atmosphere. The Moon does not give out light because it is not a star but it looks bright because it reflects light from the Sun. The part of the Moon facing the Sun is illuminated. The part facing away from the Sun is in darkness.

The Moon rotates on its axis and orbits around the Earth. This is why it seems to change its shape.



The phases of the Moon depend on its position in relation to the Sun and the Earth. As the Moon makes its way around the Earth, we see the bright parts of the Moon's surface at different angles. These are called the "phases" of the Moon. There are four main phases: new moon, first quarter, full moon and last quarter.

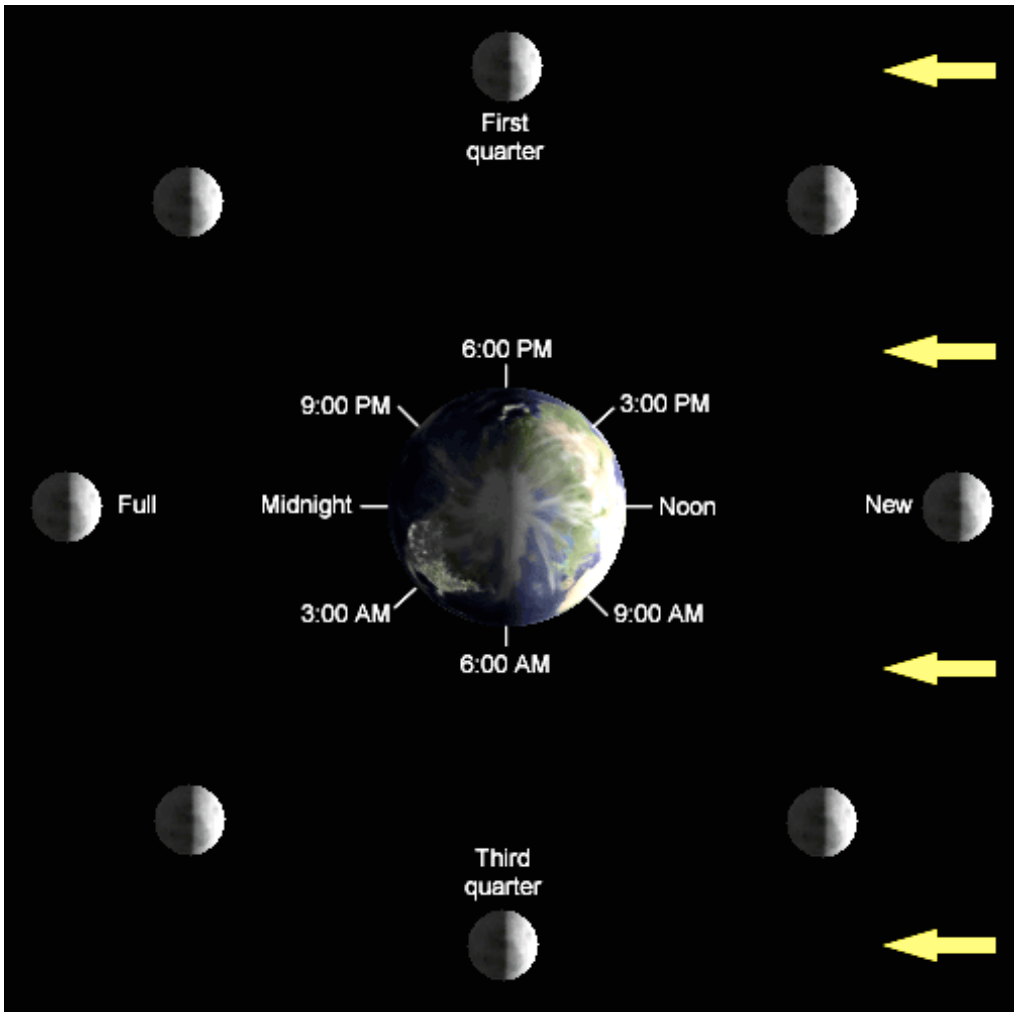


A new moon occurs when the Moon is between the Sun and the Earth. No part of the Moon is visible during this phase, so you cannot see the Moon.

The first quarter occurs when half of one side of the Moon receives sunlight. It looks like the letter D.

A full moon occurs when the Earth is between the Sun and the Moon. It looks like the letter O.

The last quarter or third quarter occurs when the side of the Moon which faces the Sun is illuminated. It looks like the letter C.



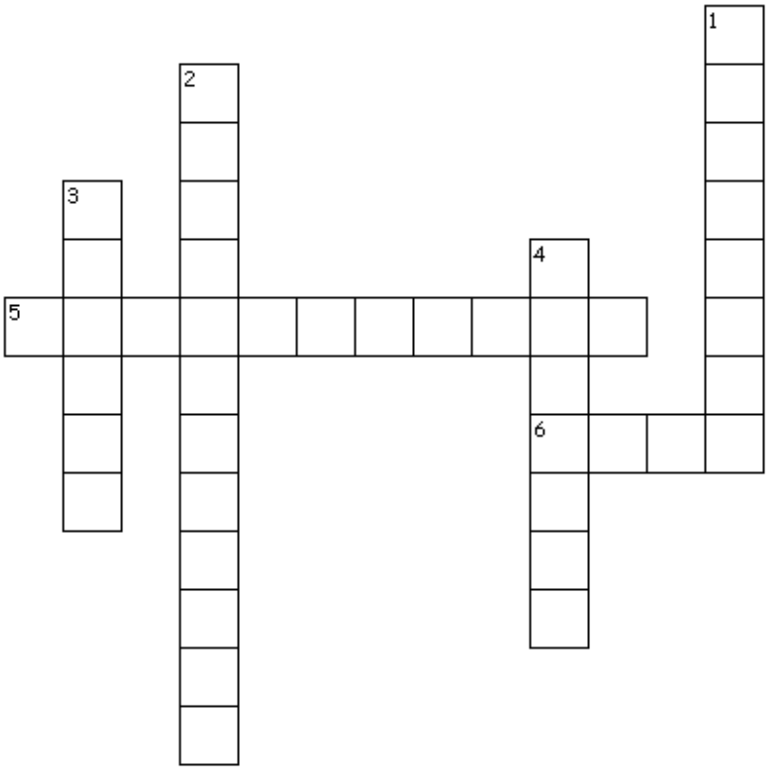
MAIN VOCABULARY

To give out: emit
Lit up: to be illuminated
Darkness: absence of light
Shape: form

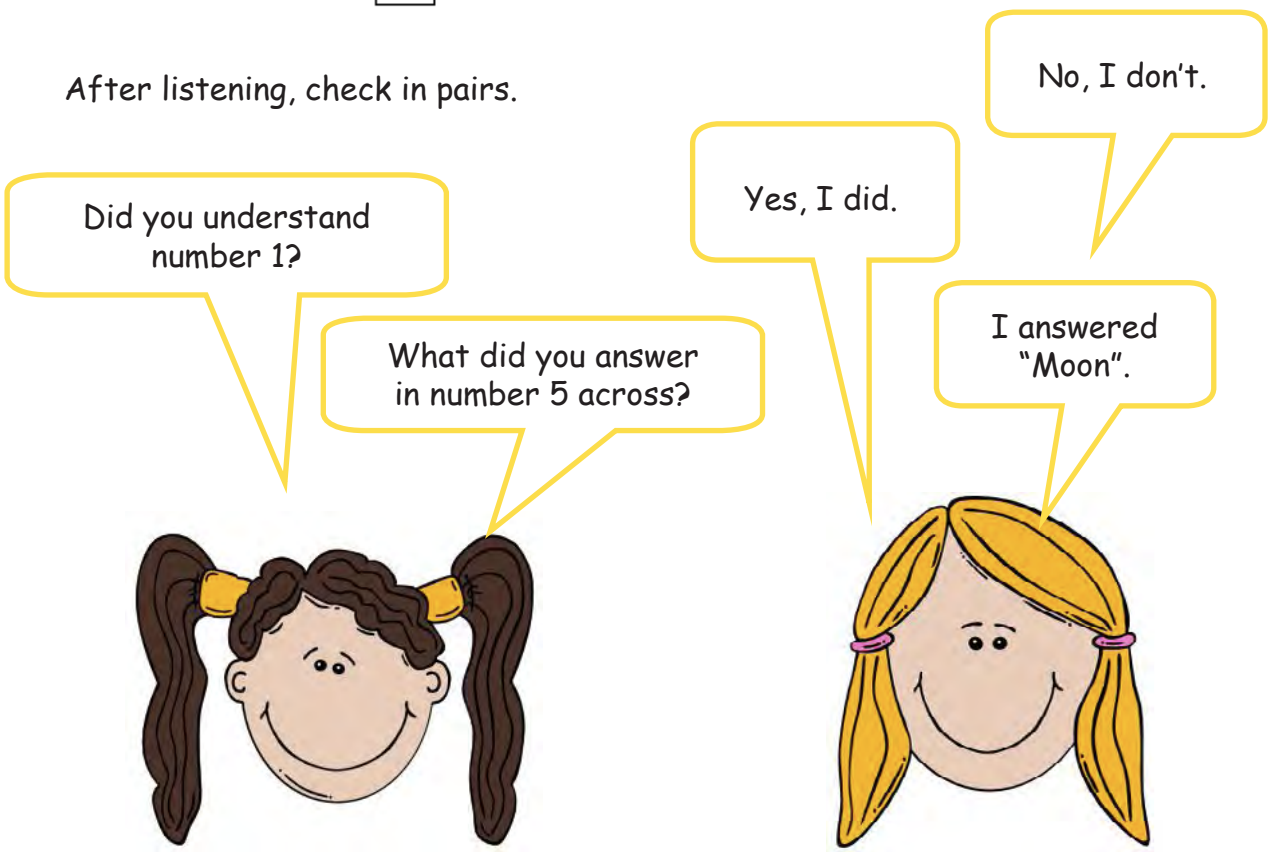
Activity 19. Crossword

Listen to your teacher and try to complete the crossword with the hints he/she is going to give you.

PHASES OF THE MOON



After listening, check in pairs.



Activity 20. Wordsearch

Look for the words below in pairs and don't forget to use the sentences in the box.

THE MOON

L A N G I G X Z N X N O L V M

T Y O S X G K S E B X O A A X

E K O T Z G S F W U Q M S P P

Z E M N Y V M I M L C Y T O B

X R L C P V P R O M M B Q Q E

G N L G T H J S O O W L U S G

K S U O A C X T N O Z M A C R

V C F S K P Q Q A N W V R M D

R F E Z V M N U G P N L T N X

I S D R G G V A D J T A E Z A

K I K S O H J R T E U I R P O

E Q K Z K S A T X O T V Y J R

E U K E A L D E F R U K M W L

D N D O I T J R G E U S A P G

S A T E L L I T E M S X M P G

FIRST QUARTER
FULL MOON
LAST QUARTER
MOON
NEW MOON
PHASES
SATELLITE

Did you find "first quarter"? Where is "moon" Do you see "phases"?	Yes, I did / No, I didn't It is next to "satellite"/ I don't know Yes, I do / No, I don't

Remember to use the language in the box to talk with your classmates

Activity 21. Moon observation

We are going to observe the Moon during one month. Everyday you have to watch the Moon and draw a picture of what you see on this worksheet. If it is cloudy, we will look for the Moon's shape on the internet. Try to describe what you see using these sentences.

Last night, the moon was like	a C, so a D, so an O, so	it was last quarter it was first quarter it was a full moon
Last night,	the moon was not visible so,	it was new moon

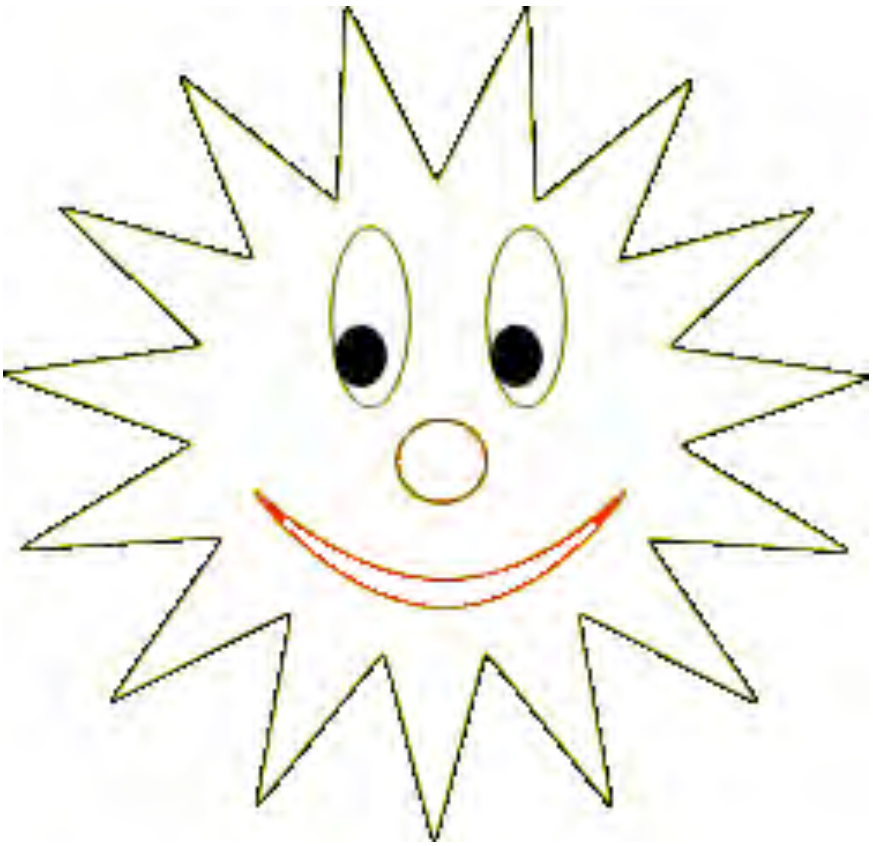
Date_____	Date_____	Date_____	Date_____	Date_____	Date_____	Date_____
Date_____	Date_____	Date_____	Date_____	Date_____	Date_____	Date_____
Date_____	Date_____	Date_____	Date_____	Date_____	Date_____	Date_____
Date_____	Date_____	Date_____	Date_____	Date_____	Date_____	Date_____

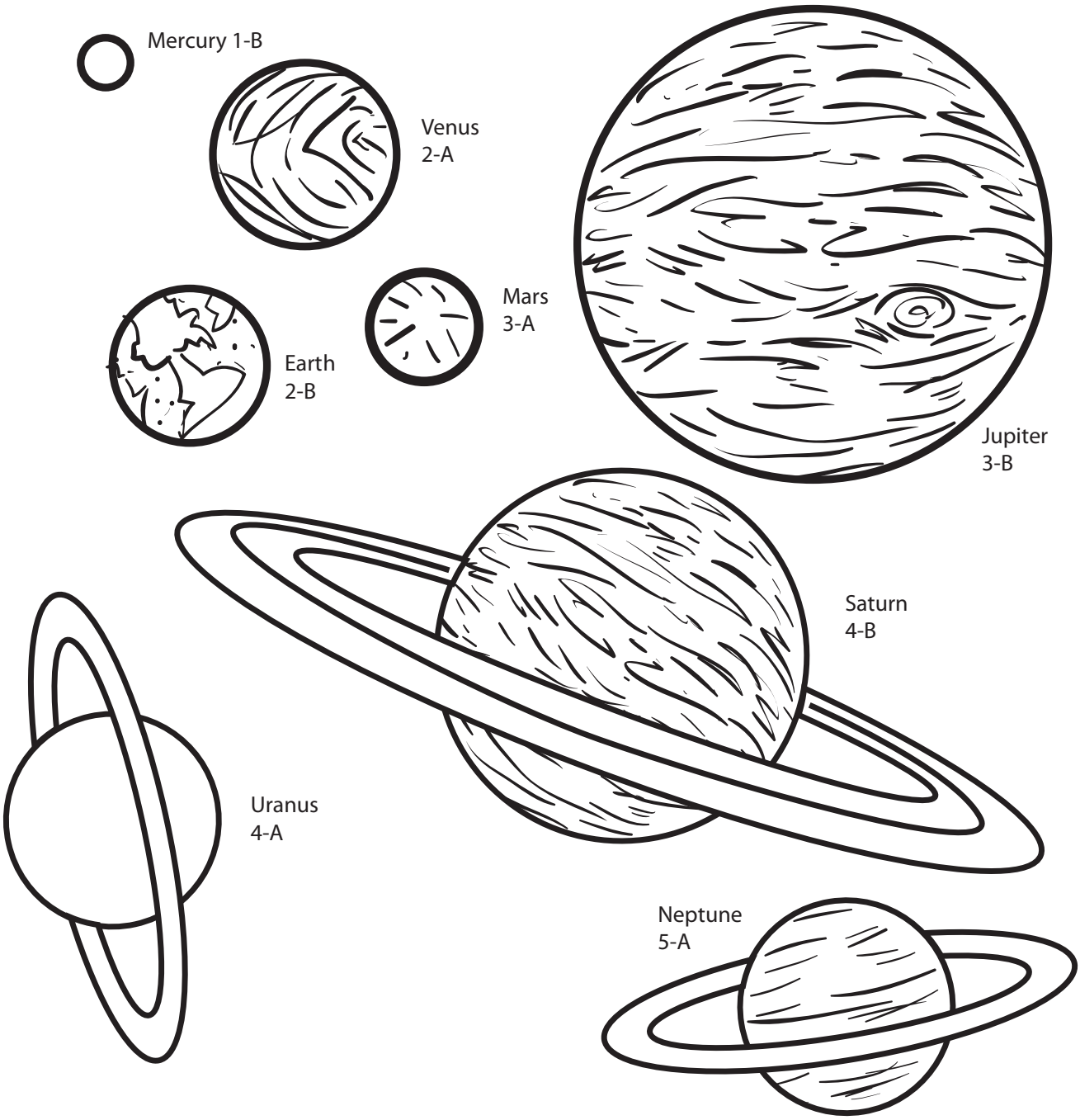
Activity 22. Model of the Solar System following instructions.

We are going to work in pairs. We need some materials: blue tak, straws and crayons. One of you will be pupil A and the other pupil B. Listen to the teacher and colour the Sun and the planets like he/she tells you to.

Pupil A

1-A





Now follow these instructions:

1. Cut out the Sun and the planets.
2. Stick them onto the straws with blue tak.
3. Label the planets.
4. Put some blue tak on the table.
5. Stick the straws in order from the closest to the furthest from the Sun.

Activity 23. Read the following text and look for the words that match the definitions

1. Underline the words in bold and use them to complete the definitions in the chart below.

The Solar System is made up of the **Sun** and the celestial bodies that revolve around it. The **Sun** is a star. The Sun is much bigger than any planet. The Sun is very important for life on Earth because it gives out light and heat.

There are different types of celestial bodies: planets, satellites, comets and asteroids.

There are eight **planets** which orbit the Sun. These planets can be classified into two groups:

- **Interior planets:** Mercury, Venus, Earth and Mars. They are small and rocky. They receive more heat and light from the Sun

- **Exterior planets:** Jupiter, Saturn, Uranus and Neptune. They are larger than the interior planets. They are made up of gases.

Satellites are celestial bodies that orbit the planets. The **Moon** is the Earth's satellite.

Comets are celestial bodies that orbit the Sun. Comets are made up of ice, dust and gases. Comets have a bright tail that reflects light.

Asteroids are celestial bodies that orbit the Sun. Asteroids are smaller than planets. Most of the asteroids are in the asteroid belt between Mars and Jupiter. Asteroids can be round or can have an irregular shape.

Stars are celestial bodies. Stars are spheres. Stars give out light and heat. Stars have different properties such as temperature, size and luminosity. From the Earth, we can see the stars like points of light in the sky because they are really far away. **Constellations** are groups of stars. Most constellations have names from mithology because they look like people, animals or objects.

Nebulae are gas clouds. Nebulae reflect the light given out by the stars next to them.

Galaxies are huge groups of stars, gases and dust. There are three types of galaxies: elliptical, spiral or irregular.

Our Solar System is in a galaxy called the **Milky Way**. It is a spiral galaxy. The Sun is not at the centre of the Milky Way.

MAIN VOCABULARY

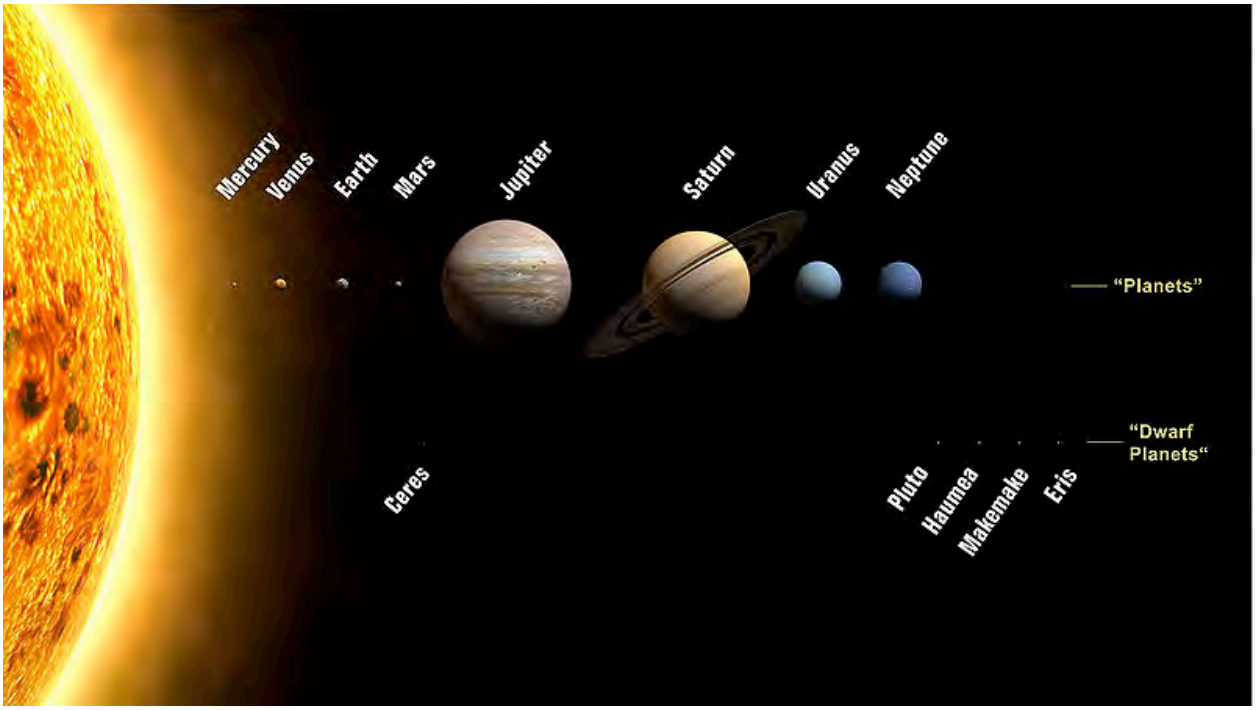
To be made up of: to be formed
Rocky: made up of rock
Dust: small particles of dirt
Huge: very big

Words	Definitions
	They give out light and heat.
	They are made up of ice, dust and gases and they orbit the Sun.
	The name of our galaxy.
	They are small and rocky.
	The Earth's satellite.
	It gives out heat and light to the Earth.
	Huge groups of stars, gases and dust.
	Gas clouds.
	Groups of stars.
	They orbit the planets.
	They orbit the Sun.
	Most of them are between Mars and Jupiter.
	They are larger than other planets.
	It is a star.

Activity 24. Read the following text and then choose the correct answer

The Solar System is made up of the Sun and the celestial bodies that revolve around it.

The Sun is a star. The Sun is made up of hot gases. The Sun is much bigger than any planet. The Sun is very important for life on Earth because it gives out light and heat.



Planets and dwarf planets of the Solar System. Sizes are to scale, but distances from the Sun are not.

There are different types of celestial bodies:

1. Planets

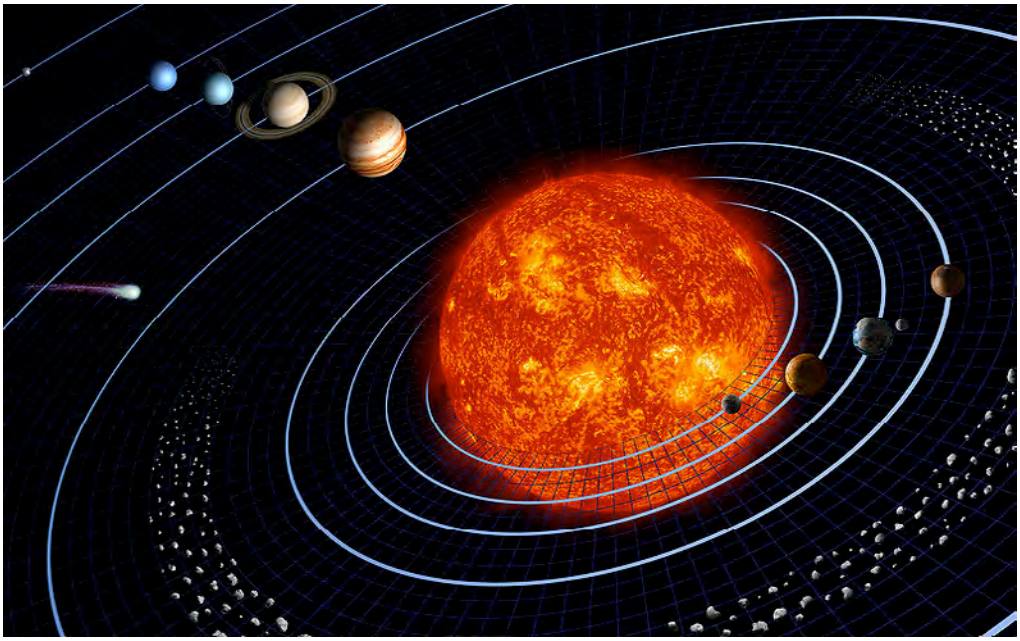
There are eight planets which orbit the Sun. These planets can be classified in two groups:

- Interior planets: Mercury, Venus, Earth and Mars. They are small and rocky. They receive more heat and light from the Sun.

- Exterior planets: Jupiter, Saturn, Uranus and Neptune.
  They are larger than the interior planets. They are made up of gases.

To remember the names of the eight planets we can use the following sentence:
" My Very Educated Mother Just Served Us Nachos".

There are also some dwarf planets such as Pluto and Eris.



2. Satellites

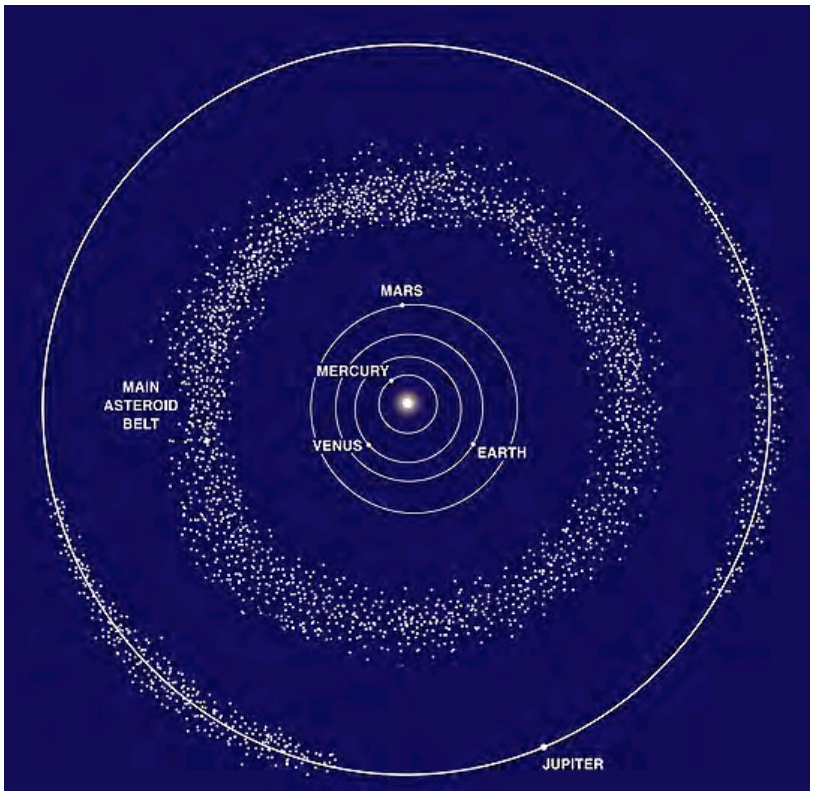
Satellites are celestial bodies that orbit the planets. The Moon is the Earth's satellite. Mars has two tiny moons, Jupiter has 63 satellites, Saturn has 62 satellites, Uranus has 27 moons and Neptune has 13 moons.

The six most well known moons of Uranus are, from left to right: Puck, Miranda, Ariel, Umbriel, Titania and Oberon.

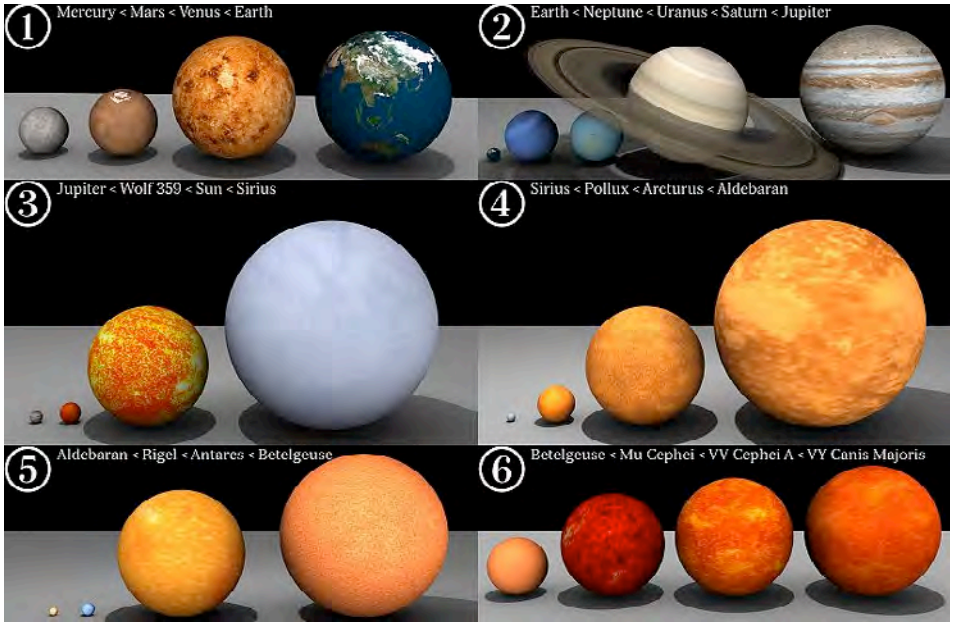
3. Comets

Comets are celestial bodies that orbit the Sun. Comets are made up of ice, dust and gases. Comets have bright tails that reflect light.

4. Asteroids are celestial bodies that orbit the Sun. Asteroids are smaller than planets. Most of the asteroids are in the asteroid belt between Mars and Jupiter. Asteroids can be round or can have an irregular shape.



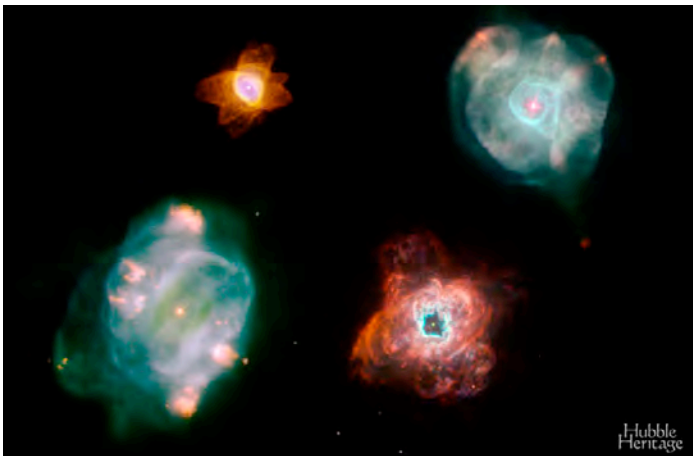
5. Stars are celestial bodies. Stars are spheres. Stars give out light and heat. Stars have different properties such as temperature, size and luminosity. From the Earth we can see the stars like points of light in the sky because they are really far away.



Relative sizes of the planets in the solar system and several well known stars

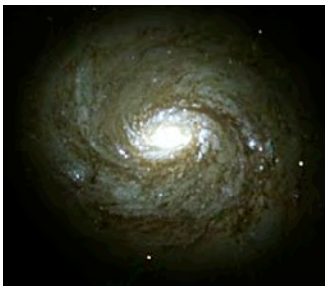
6. Constellations are groups of stars. Most constellations have names from mithology because they look like people, animals or objects.

7. Nebulae are gas clouds. Nebulae reflect the light given out by the stars next to them.



8. Galaxies are huge groups of stars, gases and dust. There are three types of galaxies: elliptical, spiral or irregular.

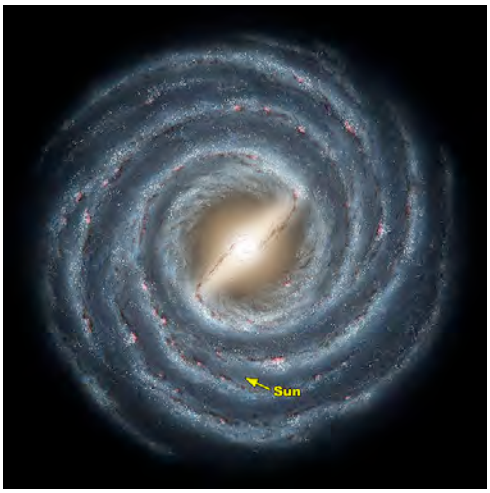
Elliptical galaxy



Spiral galaxy

Irregular galaxy

Our Solar System is in a galaxy called the Milky Way. It is a spiral galaxy. The Sun is not at the centre of the Milky Way.



Choose the correct answers:

1. The Sun is made up of:

a) Rocks
b) Gases
c) Water

2. The Sun is:

a) A planet
b) A satellite
c) A star

3. The interior planets are made up of:

a) Rocks
b) Gases

4. The Exterior planets are made up of:

a) Rocks
b) Gases

5. Pluto and Eris are:

a) Stars
b) Dwarf planets
c) Planets

6. Satellites orbit the:

a) Stars
b) Planets

7. Comets and asteroids orbit the:

a) Sun
b) Planets

8. Most of the asteroids are between:

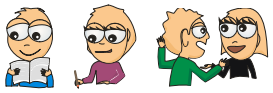
a) Earth and Mars
b) Mars and Jupiter

9. Constellations are:

a) Groups of asteroids
b) Groups of planets
c) Groups of stars

10. Our galaxy is called:

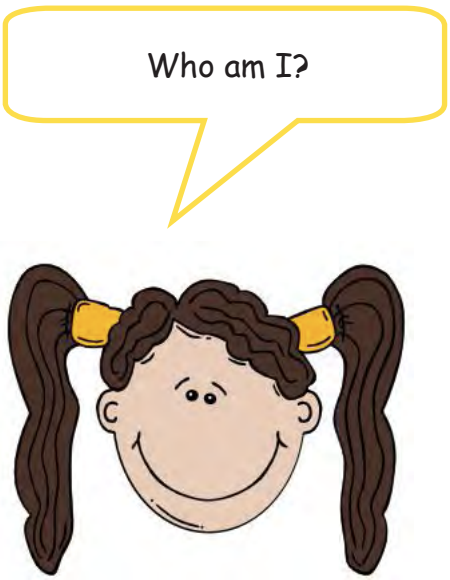
a) Milky Way
b) Solar System

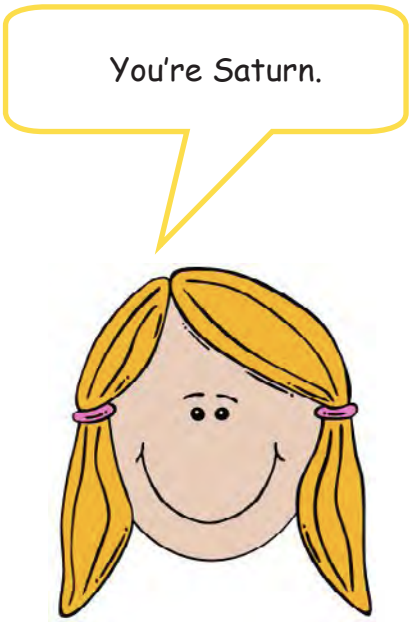
Activity 25. Role Play making planets and descriptions 

We are going to do a role play in groups of nine. We will be the planets and the Sun.

Materials: paper plates, blue tak or celo tape, a straw, felt pens or coloured pencils and a small piece of paper with the script.

1. Read the complete sentences.
2. Complete the unfinished sentences.
3. Colour your plates.
4. Stick the sentences that you completed on the back of the plate, so you can read them.
5. Walk round the classroom and say your sentences to your classmates.
6. Guess who is who.





THE SUN
1. The Sun is a star.
2. It gives heat and light to the planets.
3. It is made up of hot gases.
4. It is important for life on Earth.
5. It is five billion years old.

JUPITER
1. Jupiter is the largest planet.
2. Jupiter has 63 moons.
3. Jupiter is made of gas.
4. It has rings of ice and dust.
5. Jupiter's days last ten hours.

MERCURY
1. Mercury is the closest planet to the Sun.
2. It is very hot in the day and very cold at night.
3. It has no water or air.
4. It doesn't have any moons.
5. It is made of rock.

SATURN
1. Saturn has many rings.
2. It is made up of gases.
3. Saturn's rings are made up of ice, dust and rocks.
4. Saturn has lots of storms.
5. It has 62 moons.

VENUS
1. Venus is the second planet from the Sun.
2. It is the hottest planet.
3. It has no oxygen or water.
4. It has many volcanos.
5. It is covered with poisonous acid clouds.

URANUS
1. Uranus has 27 moons.
2. Uranus has ice on its surface.
3. Uranus is the coldest planet.
4. It is covered with blue-green fog.
5. Uranus has 42 years of day and 42 years of night.

EARTH
1. Earth is the third planet from the Sun.
2. It has a lot of water on its surface.
3. It takes 365 days and six hours to revolve around the Sun.
4. It takes one day to rotate on its axis.
5. It is the only known planet to have life on it.

NEPTUNE
1. Neptune is the last planet in the Solar System.
2. Neptune has four rings.
3. Neptune is very cold.
4. It has 13 moons.
5. Neptune's day lasts 19 hours.

MARS
1. Mars is known as the Red planet because of its red rocky surface.
2. Mars has ice at the poles.
3. Mars is very cold.
4. It has two small moons called Phobos and Deimos.
5. It has the largest volcano in the solar system.

THE SUN
1. I am a ...
2. I give ....
3. I am made up of ...
4. I am important because ...
5. I am ...

JUPITER
1. I am the ...
2. I have got ....
3. I am made of ...
4. I have rings of ....
5. My days last ...

MERCURY
1. I am ...
2. I am ...
3. I have no ...
4. I don't have any ...
5. I am made of ....

SATURN
1. I have got ....
2. I am made up of ...
3. My rings are made up of ...
4. I have got lots of ...
5. I have got .....

VENUS
1. I am...
2. I am the ....
3. I have no ...
4. I have got many ...
5. I am covered with ...

URANUS
1. I have got ....
2. I have got .....
3. I am the ....
4. I am covered with ...
5. I have 42 ...

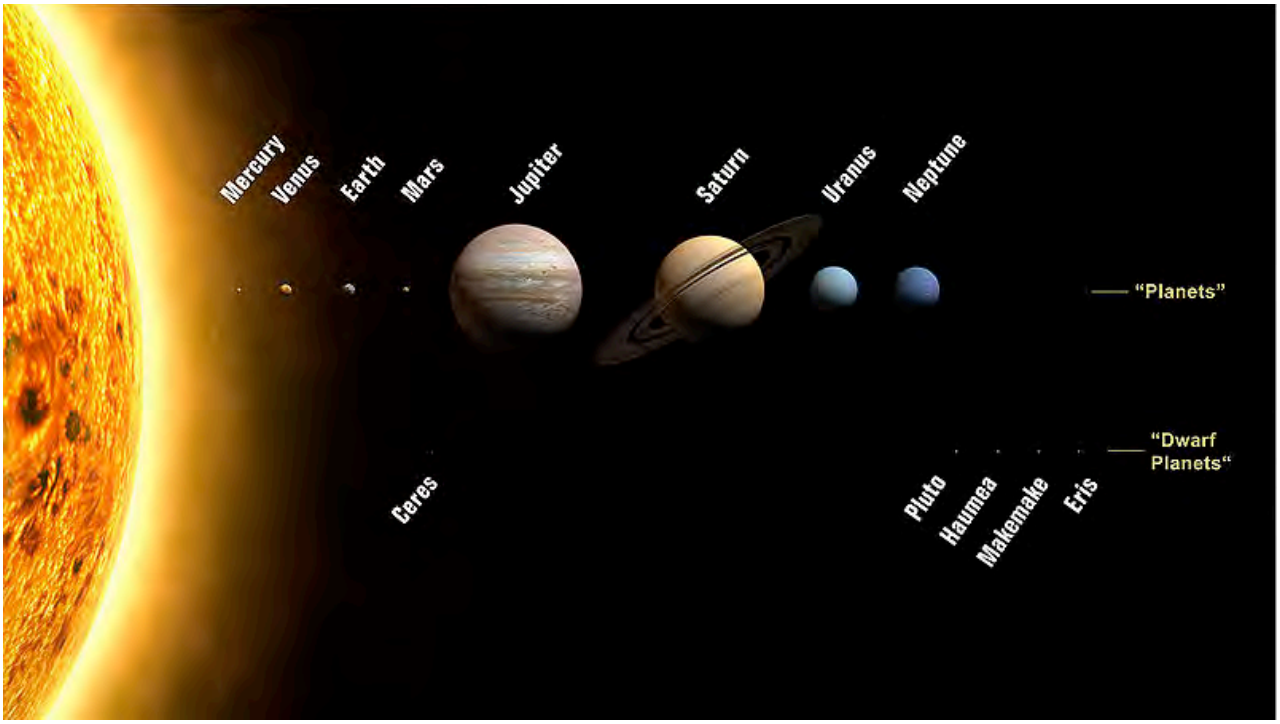
EARTH
1. I am...
2. I have ...
3. I take...
4. I take ...
5. I am the only ...

NEPTUNE
1. I am....
2. I have got .....
3. I am very ...
4. I have got ...
5. My days last ...

MARS
1. I am known as ....
2. I have got ....
3. I am ...
4. I have two .....
5. I have the largest...

Activity 26. Comparing planets

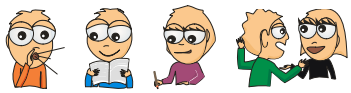
Look at this picture carefully and pay attention to the size of the planets and also to their position in the Solar System.



- Which planets are bigger than the Earth?
- Which planets are smaller than the Earth?
- Which planet is the hottest?
- Which is the coldest? Why?
- Why is it difficult to find living things on Mercury? And on Neptune?

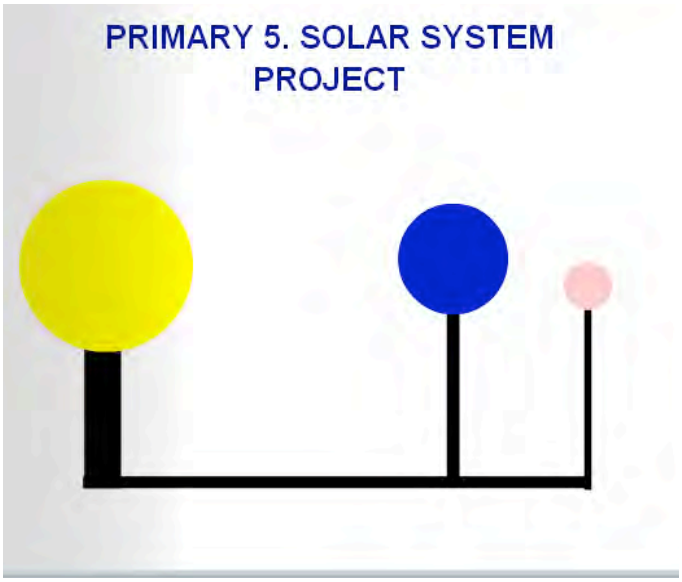
Work in pairs to answer these questions and then write a paragraph explaining your conclusions. Use the following sentences as a guide.

Jupiter, Saturn, Uranus and Neptune are _____ than the Earth.
_____, _____ and _____ are _____ than the Earth.
_____ could be the hottest planet because it is _____
_____ could be the coldest planet because it is _____
We cannot find living things on Mercury because _____



Activity 27. Solar System project: Explain a lunar or solar eclipse

Read the following instructions carefully and make a model of the Sun, the Moon and the Earth. Then, read the information and explain what a lunar or solar eclipse is. We are going to make a model to show what an eclipse is. Models are used to show things that are difficult to observe. Models also show how things work.



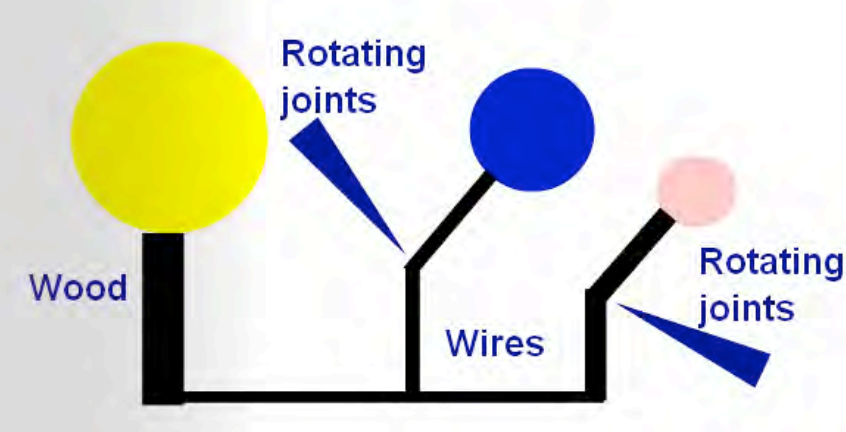
MATERIALS:

- Styrofoam balls
- A piece of wood
- Wires
- Cello tape

The polysterene balls will represent the Sun, the Moon and the Earth.
The stick of wood will be used for holding the model.

PROCEDURE:

1. Cut the wires.
2. Stick the wires into the balls. They must turn easily.
3. Look at the model and put the wires and balls like you see them in the example.
4. Wrap the end of each wire with a strip of paper to make it rotate. Use the cello tape to fasten the paper.



For your final task you have to explain what an eclipse is. You can choose between a solar eclipse or a lunar eclipse. Use the model that you built to help you explain the process to your classmates.

You can get more information about solar and lunar eclipses at the following websites:

http://www.brocodesign.com/multimedia/eclipse.html

http://www.kidseclipse.com/pages/a1b3c1d0.htm

http://lunarscience.arc.nasa.gov/kids/eclipse

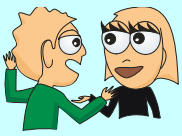
http://csep10.phys.utk.edu/astr161/lect/time/lunar_anim.html

You can also watch a video explaining solar and lunar eclipses at:

http://www.youtube.com/watch?v=ilSkZQafybk

Activity 28. SELF ASSESSMENT

Read the following statements and write a cross.

				
	I can recognise words and expressions related to the Solar System			
	I can read texts about the Solar System and understand the important information			
	I can talk about the characteristics of planets, stars and satellites			
	I can talk to my classmates about the Solar System			
	I can write about celestial bodies in the Solar System			

CITAS

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