

UNIT 5: THE ATMOSPHERE

1. CONCEPT OF ATMOSPHERE

1.1 Fill in all the gaps

ATMOSPHERE

DENSITY

LAYER

MIXTURE

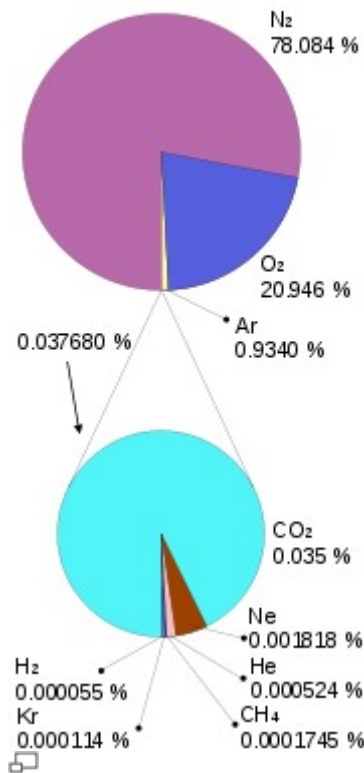
The atmosphere is a gaseous _____ which surrounds our planet. It is made of air which is a _____ of gases. The gases particles are closer at the bottom of the atmosphere than at the top. So the _____ decreases towards the highest layers of the _____.

2. COMPOSITION OF THE ATMOSPHERE



Atmospheric gases scatter blue light more than other wavelengths, giving the Earth a blue halo when seen from space

Components of dry air	(volume)
Nitrogen	78.0842%
Oxygen	20.9463%
Argon	0.9342%
Carbon dioxide	0.0384%
Other	0.0020%



Composition of Earth's atmosphere as of Dec. 1987. The lower pie represents the least common gases that compose 0.038% of the atmosphere. Values normalized for illustration.

2.1 Fill in the gaps

The main gas in the atmosphere is _____.

a-hydrogen b-oxygen c-water d-nitrogen

The atmospheric pressure is _____.

- a- higher at the bottom of the atmosphere.
- b- lower at the top of the atmosphere.
- c- The same in any place in the atmosphere.

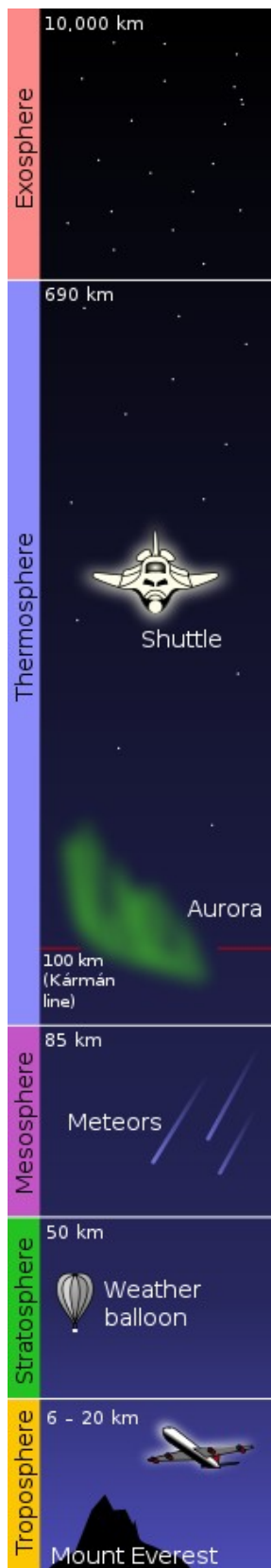
The Earth atmosphere is plenty of a gas which doesn't appear in other planets. Which gas is it?

a-oxygen b nitrogen c-carbon dioxide d-methane.

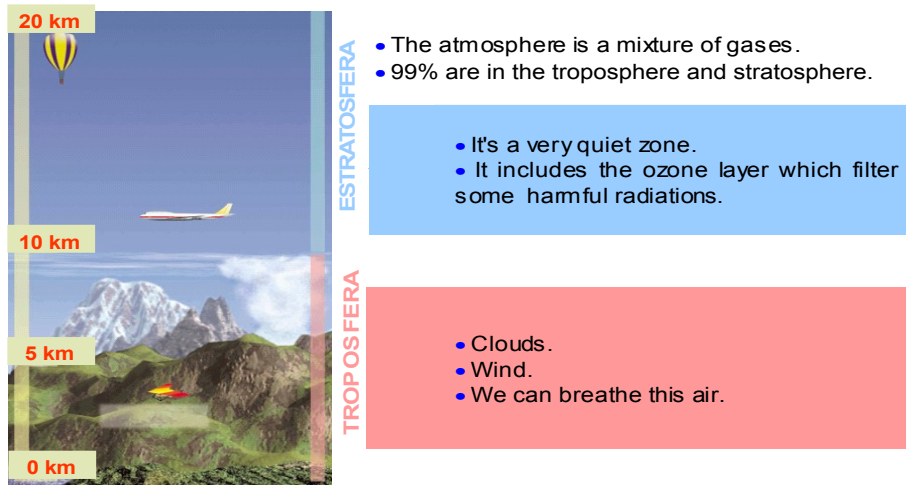
Why our planet is rich in oxygen?

- a- Because it is near the Sun.
- b- Because of the plants.
- c- Because it is far from the Sun.
- d- Because of the volcan.

3. THE LAYERS IN THE ATMOSPHERE.



THE ATMOSPHERE PROTECT US



3.1 Fill in the gaps

LIVING BEINGS

OXYGEN

ULTRAVIOLET RAYS

WARMING

The atmosphere is very important for _____ because:

- it contains the _____ we need to breathe.
- It favours the _____ of the Earth.
- It Protect us from _____.

4. THE WEATHER

- **Temperature:** freezing, cold, cool, temperate, mild, warm, hot.
- **Precipitation:** rain, snow, hail, heavy rain, flood....
- **Winds:** calm, breeze, moderate wind, strong winds, gale, tornado, hurricane
- **State of the sky:** clear sky (or sunny sky), cloudy sky, overcast, fog...
- **Other phenomena:** thunder, lightning, rainbow...

Use the following weather icons to complete the map on the next page:



Cloudy

Lightning

Partly Cloudy

Rain

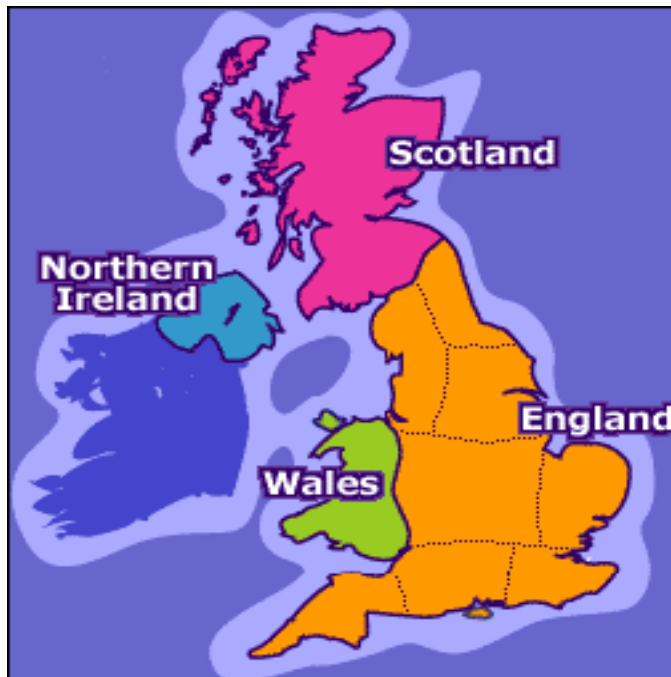
Hail

Snow

Sunny

READ the following weather forecast and draw the suitable symbols onto the map:

Rain is possible especially in the Southeast of England, cloudy skies in Wales and **Clear Skies** in the rest of the United Kingdom. **Snow and Hail** are possible from the Northeast in Wales and **Overcast skies and Wind** for the North in England and Scotland. Ireland will have **Partly Cloudy** skies and some **Precipitation**.



Write a weather description for this map:



WEATHER ELEMENTS AND INSTRUMENTS TO MEASURE THEM

Match the items on the right to the items on the left

Temperature
Atmospheric pressure
Humidity
Precipitation
Wind direction

Thermometer
Hygrometer
Pluviometer or rain gage
Barometer
Vane

STATES OF THE SKY

Match the items on the right to the items on the left.

Cielo cubierto	Overcast
Cielo nublado	Cloudy
Cielo despejado	Sunny
Soleado	Rainbow
Arcoiris	Clear sky

TYPES OF WIND

Translate:

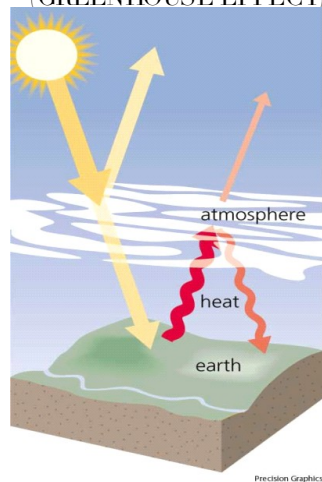
Gale
Calm
Tornado
Moderate wind
Breeze
Strong wind

CAUSES OF ATMOSPHERIC POLLUTION

Match the items on the right to the items on the left.

Global warming	CFC gases
Hole in the ozone layer	Fumes in cities
Smog	Carbon dioxide

THE ATMOSPHERE WARMS THE EARTH (GREENHOUSE EFFECT)



Relate using arrows:

. Flakes	Hailstone
. Balls of Ice	Rain
. Liquid water	Snow

- . Which type of precipitation is more dangerous for agriculture?
- . Which type is the most usual in Ubrique?
- . Which type is the most common at the top of the mountains?

GLOSSARY.

Atmospheric pressure: presión atmosférica.
Breathe: respirar.
Breeze: brisa.
Clear sky: cielo despejado.
Cloud/cloudy: nube/nuboso.
Cold: frío
Degrees Celsius: grados centígrados.
Drizzle: llovizna.
Drop: gota.
East: Este.
England: Inglaterra.
Fog or mist: niebla.
Forecast: pronóstico.
Global warming: calentamiento global.
Great Britain: Gran Bretaña.
Greenhouse effect: efecto invernadero.
Hail: granizo.
Highest temperature: temperatura máxima.
Hole in the ozone layer: agujero en la capa de ozono.
Humidity: humedad.
Hurricane: huracán.
Ice: hielo.
Layer: capa.
Lightning: rayo, relámpago.
Lowest temperature: temperatura mínima.
North: norte.
Northern Ireland: Irlanda del Norte.
Overcast: cielo cubierto.
Oxygen: oxígeno.
Pollution: contaminación.
Precipitation: precipitación.
Rain: lluvia.
Scotland: Escocia.
Smog: nieblas contaminantes.
Snow: nieve.
Sky: cielo.
South: sur.

State of the sky: estado del cielo.
Sunny, sunshine: soleado.
Storm: tormenta.
Temperate: templado.
Temperature: temperatura.
Thunder: trueno.
Tornado: tornado.
United Kingdom: Reino Unido.
Wales: Gales.
Warm: cálido (no confundir con hot)
Weather: tiempo (atmosférico).
West: oeste.
Wind/windy: viento/ventoso.