





Winds

Geography Class 23

A BRIEF DISCUSSION OF THE PREVIOUS CLASS (2:04 PM)

DRAWING WORLD MAP (2:15 PM)

- Always draw a map in a box
- Draw continents by reducing them to basic geometrical shapes like V-shaped (for the lower portion of South America), rectangles (Alaska), etc.
- Draw reference lines like the equator, prime meridian, etc. while practicing a map

WINDS (2:52 PM)

- *Important hot winds of the world*

Wind	Region	Direction
Chinook (snow-eater)	North America	From the Rockies toward Great Plains
Fonn	Europe	From the Alps toward Germany
Harmattan or Doctor wind	Nigeria	Northeast
Haboob	Sudan	Non-directional
Sirocco (Khamsin in Egypt, Gibli in Libya, Chilli in Tunisia)	From the Sahara desert towards the Mediterranean	From the Sahara desert towards the Mediterranean causing blood rain

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Berg	South Africa	coming from the interior (east to west)
Samoom or poison wind	Iran-Iraq	Non- directional
Karaburan	Northern China, Mongolia	North-east to south-west
Loo	India (Northern Plains)	From west to east
Brickfielder	Southern Australia	From north to south

- *Important cold winds of the world*

Wind	Region	Direction
Blizzard (Extremely cold and dry)	Canada and the US	North to south
Buran	Siberia	North to south
Pampero	Argentina	South to north
Southerly	Australia	South to north
Norther in the US and Norte in Mexico	The western part of the US, Mexico	South to north to South
Mistral	France, Germany	North to South
Levant	Spain	East to west
Bora	Adriatic Sea	Interior (northeast) to coast (southwest)

Levant is a region also in middle east

HUMIDITY, EVAPORATION, AND CONDENSATION (3:40 PM)

- ***Humidity***
- Water in gaseous form i.e. water-vapor present in the atmosphere is called humidity
- It helps in energy balance on the surface of the earth through evaporation and condensation
- Humidity is the index of the atmosphere's potential for yielding precipitation
- *Specific humidity*
- It is the ratio of the weight of water vapor in grams to the weight of air in Kg expressed as grams/Kg of air
- It indicates the actual amount of moisture present in the air
- *Absolute humidity*
- It is the ratio of the weight of water vapor in grams to the volume of air in a cubic meter expressed as grams/m³ of air
- Absolute humidity decreases with the expansion of air and decreases with the contraction
- *Relative humidity*
- It is the ratio between the amount of water vapor present in the air to the maximum amount of water vapor it can hold at a given temperature
- Relative humidity decreases with an increase in temperature and increases with a decrease in temperature

- ***Evaporation***

- It is the process of conversion of liquid water into water vapor

- ***Factors affecting evaporation***

- The temperature of air and water- Higher the temperature, the higher the rate of evaporation
- The humidity of the air- Higher the humidity, the lower the evaporation due to the saturation of air
- Surface area- Higher the surface area, the higher the rate of evaporation
- Wind speed- Higher the wind velocity, the higher is evaporation; since the air movement provides a constant supply of fresh air
- The salinity of water- Higher the salinity, the lower is evaporation

- ***Distribution of evaporation***

- It is maximum around sub-tropics due to high temperature and low humidity level
- Near polar regions, lower evaporation due to low temperature
- Evaporation is greater over oceans than over continents

The topic for the next class: **Condensation, stability/instability in air, clouds, thunderstorms**

Wind speed is high there because of less friction and surface area is also high