CLASS-5

SOCIAL STUDIES

CHAPTER-2

LONGITUDES AND LATITUDES

A. Circle the correct options.

1. How many lines of latitude are there? (90/181)

Ans: 181

2. Who circumnavigated the Earth to prove that it is spherical in shape?

(Ferdinand Magellan/Copernicus)

Ans: Ferdinand Magellan

3. Which line of longitude is assumed to be crossing the Royal Observatory in Greenwich? (North Pole/Prime Meridian)

Ans: Prime Meridian

4. Which latitude is also called the Great Circle? (South Pole/Equator)

Ans: Equator

5. What is the network of intersecting lines used to find the exact location of a place known as? (Grid/Arctic Circle)

Ans: Grid

B. Fill in the blanks.

- 1. The shape of the Earth is like an <u>orange</u> but slightly flattened at the top and at the **bottom**.
- 2 Lines of Longitudes meet at the poles and they are farthest apart at the equator.
- 3. <u>Lines of Latitudes</u> are parallel equidistant lines at a distance of 1^0 towards the north and south from the equator.
- 4. Antarctic Circle is located at 66 ½ 0 S from the equator.
- 5. The lines of longitude run from **north** to **south**.

C. Answer the following questions in short.

1. What are longitudes and latitudes?

Ans: The imaginary lines that run vertically from the north to the south are called longitudes and the imaginary lines circling around the Earth from east to west are called latitudes.

2. Name some important lines of latitude.

Ans: The important lines of latitude are as follows:-

- 1) Arctic Circle (66 ½ 0 N)
- 2) Tropic of Cancer (23 ½ ⁰ N)
- 3) Equator (0^0)
- 4) Tropic of Capricorn (23 ½ ° S)
- 5) Antarctic Circle (66 ½ 0 S)
- 3. What is the Prime Meridian?

Ans:

- 1. The longitude line which is marked at 0^0 that run from north to south is called Prime Meridian.
- 2. This longitude divides the wold into two equal halves.
- 4. How many lines of latitude are there?

Ans: There are 181 lines of latitude.

D. Answer the following questions in detail.

1. How do we find the location of a place on Earth?

Ans: The lines of longitudes and latitudes intersect each other at a right angle which form grid on map or globe, which help us to find any location of a place on Earth. Hence the points where these lines intersect each other provide us a location coordinate, which help us in locating a place on the globe.

2. Who proved that the Earth is spherical in shape? How?

Ans: In the 16th century, a Portuguese explorer Ferdinand Magallan proved that the Earth is spherical in shape.

- 1. He started his journey along with his team from Seville in Spain in 1519.
- 2. He died on the way, so the journey was completed by his team in 1522.
- 3. When his team reached back Seville they proved that Earth was spherical in shape.
- 3. Differentiate between longitudes and latitudes.

Ans: Difference between longitudes and latitudes:

Longitudes:

- 1. Longitude lines run vertically from the North Pole to the South Pole.
- 2. All the lines of longitude are of the same length.
- 3. They meet at the poles and are farthest from each other at the equator.
- 4. There are 360 lines of longitude.
- 5. They help in determining time.

Latitudes:

- 1. Latitude lines are horizontally circling around from east to west.
- 2. The length of the lines are different.
- 3. These lines are parallel.
- 4. There are 181 lines of latitude.
- 5. These lines classify different heat zones.

E. Think and answer.

1. Why do we have 360 longitudes and only 181 latitudes?

Ans: For the following reasons we have 360 longitudes and only 181 latitudes:

- 1. The longitudes lines passes from North Pole to South Pole.
- 2. The longitudes lines starts from zero and ends at 360 longitude.
- 3. There are 180 lines of longitude to East and 180 to West. So, we have 360 longitudes.
- 4. The lines of latitudes are drawn at the interval of 10.
- 5. There are 90 parallels in the Northern Hemisphere, and 90 in the Southern Hemisphere.
- 6. Thus there are 181 latitudes in all including the Equator.
- 2. Why do the lines of latitude decrease when moving towards the poles?

Ans: The lines of latitude decrease when moving towards the poles because they are not all equal in length. It is because they are complete circles that remain equidistant from each other. The lines of latitude vary in size from the longest at the equator to the smallest, which are just single points, at the North and South Poles.