

## Answer Key

# "Where am I?"

The latitude and longitude of a point are called its coordinates. If you know the coordinates, you can use a map to locate any point on Earth. Using the application City Zen, find out where in the world you are. Hint: Make sure you are in the select tool of City Zen. There should be a question mark in the circle. Use the Find Mode to find the following cities then write in their latitude and longitude by holding stylus down on city.

- |                      |  |   |
|----------------------|--|---|
| 1. Omaha             | Latitude: $\frac{95^\circ \text{ W}}{\underline{\hspace{2cm}}}$      | Longitude: $\frac{41^\circ \text{ N}}{\underline{\hspace{2cm}}}$    |
| 2. Washington, D.C.  | Latitude: $\frac{76^\circ \text{ W}}{\underline{\hspace{2cm}}}$      | Longitude: $\frac{38^\circ \text{ N}}{\underline{\hspace{2cm}}}$    |
| 3. Boston            | Latitude: $\frac{71^\circ \text{ W}}{\underline{\hspace{2cm}}}$      | Longitude: $\frac{42^\circ \text{ N}}{\underline{\hspace{2cm}}}$    |
| 4. Sydney, Australia | Latitude: $\frac{150^\circ \text{ E}}{\underline{\hspace{2cm}}}$     | Longitude: $\frac{33^\circ \text{ S}}{\underline{\hspace{2cm}}}$    |
| 5. Sea of Japan      | Latitude: $\frac{131-132^\circ \text{ E}}{\underline{\hspace{2cm}}}$ | Longitude: $\frac{36-37^\circ \text{ N}}{\underline{\hspace{2cm}}}$ |
| 6. Paris, France     | Latitude: $\frac{2^\circ \text{ E}}{\underline{\hspace{2cm}}}$       | Longitude: $\frac{48^\circ \text{ N}}{\underline{\hspace{2cm}}}$    |

Write the name of a city and give the latitude and longitude of that particular location.

- |                                      |                                      |                                       |
|--------------------------------------|--------------------------------------|---------------------------------------|
| 7. City: $\underline{\hspace{2cm}}$  | Latitude: $\underline{\hspace{2cm}}$ | Longitude: $\underline{\hspace{2cm}}$ |
| 8. City: $\underline{\hspace{2cm}}$  | Latitude: $\underline{\hspace{2cm}}$ | Longitude: $\underline{\hspace{2cm}}$ |
| 9. City: $\underline{\hspace{2cm}}$  | Latitude: $\underline{\hspace{2cm}}$ | Longitude: $\underline{\hspace{2cm}}$ |
| 10. City: $\underline{\hspace{2cm}}$ | Latitude: $\underline{\hspace{2cm}}$ | Longitude: $\underline{\hspace{2cm}}$ |
| 11. City: $\underline{\hspace{2cm}}$ | Latitude: $\underline{\hspace{2cm}}$ | Longitude: $\underline{\hspace{2cm}}$ |
| 12. City: $\underline{\hspace{2cm}}$ | Latitude: $\underline{\hspace{2cm}}$ | Longitude: $\underline{\hspace{2cm}}$ |

Knowing latitude and longitude of locations can help you figure out the distance between two points. Using the application **Distance**, enter the latitude and longitude for two points on Earth and tap the calculate button to get the distance in miles. Round each answer to the nearest hundredth of a mile. Make sure you label your distance.

<b>Location 1: Omaha</b>	
Latitude: 41° 18'N	Longitude: 95° 54'W
<b>Location 2: Lincoln</b>	
Latitude: 40° 51'N	Longitude: 96° 45'W

**Distance Between**

54.17 miles

<b>Location 1: Omaha</b>	
Latitude: 41° 18'N	Longitude: 95° 54'W
<b>Location 2: St. Paul, MN</b>	
Latitude: 44° 53'N	Longitude: 93° 13'W

**Distance Between**

282.12 miles

<b>Location 1: Washington, D.C.</b>	
Latitude: 38° 51'N	Longitude: 77° 02'W
<b>Location 2: Los Angeles, CA</b>	
Latitude: 33° 56'N	Longitude: 118° 24'W

**Distance Between**

2,310.97 miles

<b>Location 1: Nairobi, Kenya</b>	
Latitude: 1° 16'S	Longitude: 36° 48'E
<b>Location 2: Mexico City, Mexico</b>	
Latitude: 19° 24'N	Longitude: 99° 12'W

**Distance Between**

9,218.42 miles

<b>Location 1: Manila, Philippines</b>
Latitude: 14° 35'N      Longitude: 120° 59'E
<b>Location 2: Lima, Peru</b>
Latitude: 12° 5'S      Longitude: 77° 03'W

**Distance Between**

**11,223.50 miles**