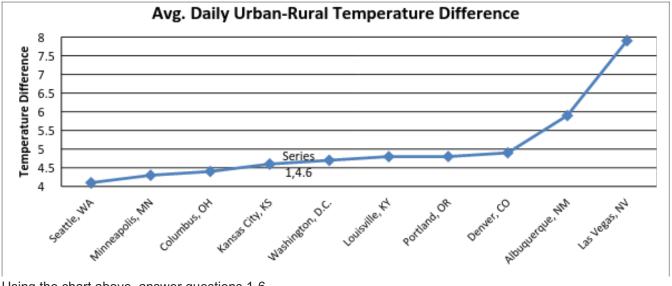
Name:	Period:	

## Microclimate: Urban Heat Islands

**Definition** - a city or metropolitan area that is significantly warmer than its surrounding rural areas due to human activities.



Using the chart above, answer questions 1-6.

- 1. Looking at the chart above, what is the temperature difference in Portland, OR?\_\_\_\_\_
- 2. What city shown has the highest temperature difference?
- 3. Why do you think that is so?
- 4. What region is not really represented on the chart?
- 5. What two cities shown have the same temperature difference?\_\_\_\_\_
- 6. Explain the title of the chart and what the data is showing?\_\_\_\_\_
- 7. Will buildings absorb more or less light than natural ground cover?
- What other surfaces in cities absorb light energy?\_\_\_\_\_\_
- 9. How does the absorption of light energy affect the climate of cities?\_\_\_\_\_\_
- 10. What is the urban canyon effect?\_\_\_
- 11. Give 5 examples of an Urban Heat Island.
- 12. How does an UHI affect nearby streams?
- 13. How does an UHI affect wildlife in the city?
- 14. How do UHI affect the weather surrounding cities?\_\_\_\_\_
- 15. How do UHI affect the health of city residents?\_\_\_\_\_
- 16. How do UHI affect the energy usage of the city itself?\_\_\_\_\_
- 17. What types of strategies can cities use to mitigate (lessen) the impact of the UHI?\_\_\_\_\_