

Space Exam Style Questions 1

1. The table below shows information about several planets.

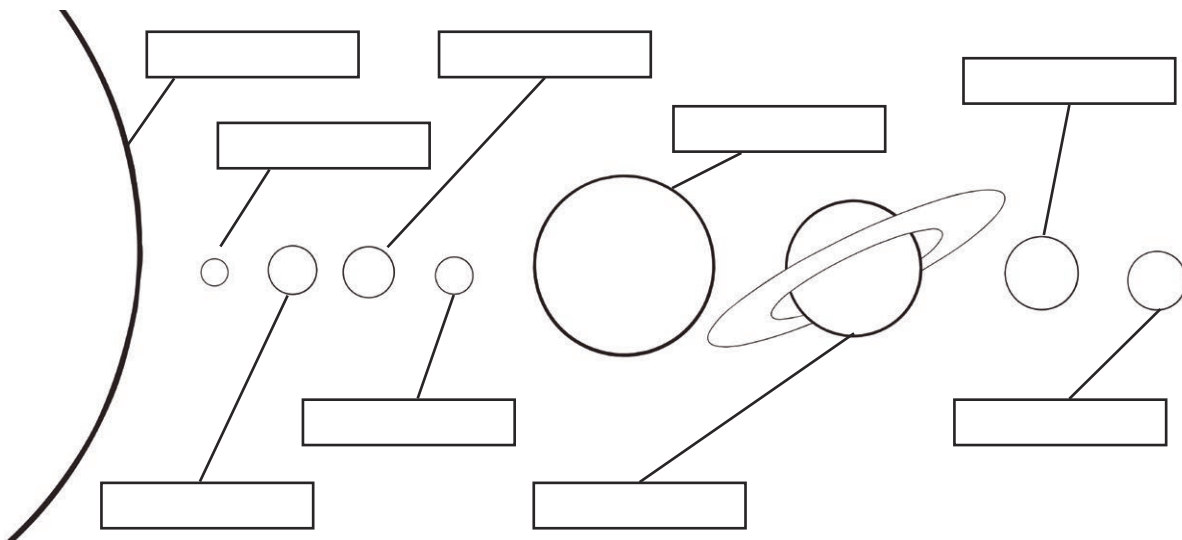
Planet	Time for one orbit (earth years)	Average surface temperature °C	Distance from Sun (million km)
Mars	687 days	-82 to 0	228
Jupiter	12 years	-150	778
Saturn	29 years	-170	1427

How does the surface temperature of the planets relate to their distance from the Sun?

Why do you think the temperature changes in this way?

Uranus is 2870 million km away from the Sun. Give an estimate of its surface temperature.

2. The diagram below shows the planets in the solar system. Label the planets.



It takes Jupiter much longer than Mars to complete one orbit of the Sun. Give 2 reasons for this.

1)

2)

Space Exam Style Questions 1 Answers

1. The table below shows information about several planets.

Planet	Time for one orbit (earth years)	Average surface temperature °C	Distance form Sun (million km)
Mars	687 days	-82 to 0	228
Jupiter	12 years	-150	778
Saturn	29 years	-170	1427

How does the surface temperature of the planets relate to their distance from the Sun?

It decreases/ becomes cooler the further away it is.

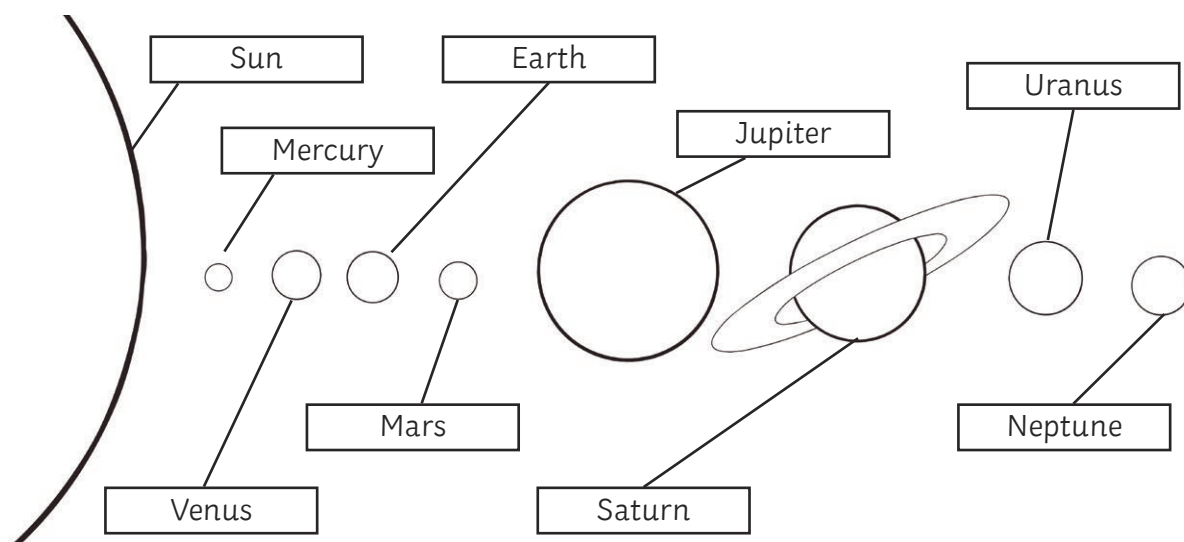
Why do you think the temperature changes in this way?

Less heat from the Sun reaches the planets.

Uranus is 2870 million km away from the Sun. Give an estimate of its surface temperature.

Accept -180 °C to -200 °C.

2. The diagram below shows the planets in the solar system. Label the planets.



It takes Jupiter much longer than Mars to complete one orbit of the Sun. Give 2 reasons for this.

- 1) **Has a longer orbit**
- 2) **Travelling at a slower speed.**