

HOW TIDES WORK - PART I

The earth does one complete rotation each day.

The red dots show where you are on the earth. When the sun and moon are in line with the red dot there is a high tide. After around six hours (one quarter of a day) the red dot moves as the earth spins. It is no longer in line with the sun and the moon, so there

is a low tide. After another six hours the red dot is back in line on the opposite side to where it started and so there is a high tide. Another six hours on and the dot is not in line, so the tide is low again.

Therefore there are TWO tides in a day. A tidal cycle has one low and one high tide.

This is not the same all around the world. Some places only have one low and one high tide per day and others have hardly any tide at all!

Based on the information above look at the diagrams below and decide if the position of the sun, moon and red dot will give a high or a low tide. You can circle the right answer.

