B2.2. U-2.15 STUDENT _____ DATE _____

Our planet is made

up of four main layers. The centre is called the core and is the hottest part of the planet. It is divided into two layers, the inner core and the outer core. Around the core is a layer of liquid rock known as the mantle. The final layer is a thin layer of solid rock known as the crust. It is thin compared to the other parts, but in reality that still means it is between 10 and 45 kilometres thick! It is not one **uniform** surface but is broken up into many smaller **independent** pieces called plates, like a cracked eggshell or a jigsaw.

Powerful currents in the mantle cause the plates to move around constantly. The plates usually move at a rate of 1-10 cm a year, but this tiny movement has **incredible** effects where the plates meet. The towering Himalayan mountains were formed by two plates pushing into each other and the fiery volcanoes of Iceland are the result of two plates moving apart. Earthquakes, however, tend to **occur** at the third kind of **boundary** – where plates slip alongside each other. This is because two plates never **slide** past each other smoothly. The rocks catch on each other so that the plates are still pushing. Pressure gradually builds up until the rocks can no longer stand the pressure and they suddenly give way. This movement travels to the surface in waves that **shake** the ground.

Most earthquakes are so tiny that we don't even feel them. Small earthquakes are useful because they **release** the dangerous pressure between the plates. Every few years, however, enough pressure builds up to produce a large earthquake, often with **catastrophic** results for human life and buildings in the affected area. Afterwards the plates start moving once more until they get stuck again, and so the whole **process** starts over. Such earthquakes are nature's reminder that we don't stand on solid ground.

Ex.2 Read the text and answer the questions:

The earth is made of **1)**_____. The outer -most layer is called the **2)**_____. The crust is **3)**_____ moving because of the **4)**_____ in the **5)**_____. The outer layer can be up to **6)**_____. The crust is made of many smaller piecies called **7)**_____. Pressure from the **8)**_____ (the layer beneath the crust) causes the **9)**_____ to **10)**_____. Plates move very **11)**_____, at only from 1 to **12)**_____ a year. As they rub past each other, they sometimes become stuck. When the pressure become too great, an **13)**_____ occurs. Earthquakes release **14)** _____ and help the plates to **15)**_____ again. The movements of the plates causes **16)** _____, **17)** _____ and the formation of **18)** _____.

3 **Match the words in bold in the text to their definitions (1-10).**

1 ☐ the limit or edge of an area of land
2 ☐ set free, let go
3 ☐ separate, not connected to other things
4 ☐ causing enormous damage
5 ☐ happen, take place
6 ☐ even and regular
7 ☐ series of events which lead to a change
8 ☐ hard to believe
9 ☐ cause to move backwards and forwards
10 ☐ move smoothly or quietly over sth else

a uniform
b independent
c incredible
d occur
e boundary
f slide
g shake
h release
i catastrophic
j process