**The National Orthodox School /Shmaisani**

**Subject: Science/ Physics**

**Name: Title: Pressure Worksheet**

**Date: Grade-Section: 8- ……CS**

Question 1) A block of weight 850N has a length of 0.5 m and a width of 0.4 m and a height of 0.3 m.

1. Find the smallest pressure that this block exerts on the ground.

 P min=F/Amax=0.5\*0.4=0.2m

 P min= 850/0.2=4250N/m

1. Find the largest pressure that this block exerts on the ground.

 P max=F/A= 0.4\*0.3=0.12m

 P max=850/0.12=7083.30 N/m

Question 2) The force applied to a 0.4 cm by 0.8 cm brake pad produces a pressure of 500 N/cm². Calculate the force applied to the brake pad.

A=L\*W=0.8\*0.4=0.32Cm

F=P\*A=500\*0.32=160N