Answers to selected questions in Lab #1

6) Earth-Moon distance = 60 * Earth radius = `60 * 6.4*10^3 = 3.84*10^5 km`

7) Earth-Sun distance = Earth-moon distance * 400 = `400 * 3.84*10^5= 1.54*10^8 km`

13) 70 cm x 4cm = 280 cm^2. Note the unit is cm^2, that is squared centimeter.

15)

distance = speed * time = 30 km/sec * 10 year = 30 km/sec * 10 year * **3.15E07 sec/year** = 9.45E+09 km

Note that the part in bold equals 1. That is, 1 = 3.15E07 sec/year.

16)

No. The sample is too limited as college students are not typical of all human. Need to include factors like age, race. etc. Note that just saying "a group of 20 people does not represent all human being" is not enough. You have to explain why it is not representative.