21

Gloria manages an apartment building. The building has only two sizes of apartments: small and large. The table below shows the rental income per month for each apartment size.

Apartment Rental Income

Apartment Size	Rental Income per Month
small	\$ 800
large	\$1200

a. What is the total rental income for one month when 3 small apartments and 4 large apartments are rented? Show or explain how you got your answer.

For parts (b), (c), and (d), define x and y as follows:

- x = the number of small apartments in the building
- y = the number of large apartments in the building
- b. Last month all the apartments in the building were rented. The total rental income for the month was \$17,600. Write an equation in terms of x and y that represents this information.
- c. The total number of small apartments and large apartments is 18. Write an equation in terms of x and y that represents this information.
- d. Using the information in parts (b) and (c), determine the following:
 - the number of small apartments in the building
 - the number of large apartments in the building

Show or explain how you got each of your answers.