Merit/Excellence – Answer the following questions.

267. A company's ratio of sales of three different types of calculators are 6 : 3 : 2 (scientific, graphic and algebraic). If the company sells 15 graphic calculators in one month how many scientific and algebraic calculators did they sell?

268. A company has a ratio of male to female employees of 15 : 11. Currently the company has 208 employees, but is offering voluntary redundancy to any male staff so that the ratio reduces to 12 : 11. How many male staff can accept voluntary redundancy?

269. The cost ratio in building a new house is 21 : 5 : 4 (construction : decor : landscaping). If the Smith's spend $112 500 on landscaping, and decor what is their construction costs and the total cost of the new house?

270. If the ratio 4 : x = x : 9, find the value of x.

272. The cost ratio in printing a number of books is 4 : 2 : 1 (printing : paper : cover). If a publisher spends $45 000 on printing plus covers, how much would the paper component be and what is the total printing cost?

271. If the ratio 25 : 4x = x : 4, find the value of x.

273. If the ratio 9 : 2x – 4 = 5 : x, find the value of x.

274. A company has a sales ratio of Workbooks to Homework Books of 11 : 8. Last year it sold 53 200 books in total. By how much would its Homework Book sales have to drop so its sale ratio became 77 : 50?