Mid-Chapter Review

1. Describe each term in your own words.

   a) interest _e.g., amount of money earned on an investment_

   b) annual interest rate _e.g., percent earned on an investment each year_

   c) principal _e.g., the money invested, the starting amount_

2. Renée runs a hair salon in Flin Flon. She was saving for new salon chairs. She earned $75.25 in simple interest on a 3 yr investment. The interest rate was 2.4%/yr.
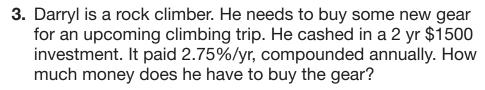
   a) How much did Renée invest?

   e.g., $75.25 = P(0.024)(3)

   $1045.138... = P

   Renée invested $1045.14.

   b) How much does Renée have to spend on new chairs?

   e.g., A = $1045.14 + $75.25, or $1120.39

   Renée has $1120.39 to spend on new chairs.

3. Darryl is a rock climber. He needs to buy some new gear for an upcoming climbing trip. He cashed in a 2 yr $1500 investment. It paid 2.75%/yr, compounded annually. How much money does he have to buy the gear?

   e.g., $A = \$1500(1 + 0.0275)^2$

   $= \$1583.634...$ Darryl has $1583.63 to buy the gear.

4. Giacomo earned $12.17 in simple interest on his investment of $1000. The interest rate was 1.5%/yr. How long did he invest the money? Round up the number of days.

   e.g., $12.17 = ($1000)(0.015)(t)

   $\dfrac{\$12.17}{(\$1000)(0.015)} = t$

   So t = 0.811... yr × 365 d/yr = 296.136... d, or 297 d

   He invested the money for 297 d.