

Please select the correct answer number for each question. There are more answers than questions. Answers may be repeated.

1) **78.3 years, 79.0 years, 80.1 years**

2)

\$3285.60; no, because the data point is so far from the data set used to create the model. There is no way to predict what changes may occur between 2000 and 2050.

3)

$0.0000006x^3 - 0.0005101x^2 + 0.1270416x + 2.0612682$; about 12 yr

4) **245.8 troy oz., 787.8 troy oz., 1272.1 troy oz.**

5) **$y=3.5x+1$**

6)

$y = -2x^3 - x^2 + 3x - 4$; this is a good fit because $R^2 = 1$.

Your friend should have used $x = 10$ because 1920 is 10 years after the data set began not 10 years before. The correct estimate is 13.1%.

7)