STUDENT NAME _____ **CLASS PERIOD** _____ **DATE** _____

Unit 3-5: Compound Interest Formula Quiz 2

Formulas:

Simple Interest Formula $I = prt$

Compound Interest Formula $B = P\left(1 + \frac{r}{n}\right)^{nt}$

APY Formula $APY = \left(1 + \frac{r}{n}\right)^{n} - 1$

Answer the following questions on this paper. Show your work or the key strokes you used on the calculator as this will also be a part of the grade.

1. John and Cindy receive $15,000 in gifts from relatives for their wedding. They deposit the money into an account that pays 2.5% interest, compounded monthly.
    a. What will be their balance at the end of 14 years?

    b. What will be their balance at the end of 20 years?

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2. Alex opens a savings account with $1,000 that pays 3.25% interest, compounded quarterly. How much interest does Alex earn in the first quarter?

3. The neighborhood bank has a special 4.65% APR for deposits over $5,000. Ray has $26,000 to invest for one year. The interest is compounded monthly. Find the annual percentage yield for Ray's account to the nearest hundredth of a percent.

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