Financial Literacy: Rule of 72 - Just for Fun

First, what is the "Rule of 72"? The "Rule of 72" is magical, **considered the most important and simple rule to financial success**. Why, you ask? When the number 72 is divided by the interest rate (percentage rate paid on money saved, invested or owed), the answer is the number of years it will take that money to double. For example, if you have an investment of $1000.00 sitting in an account that earns 10% interest, it will take 7.2 years (72/10=7.2) for your investment to double to $2000.00.

Do: Complete the final column of the chart by using the "Rule of 72" equation to calculate how many years it will take the original investment to double. *Equation*: 72/interest rate=# of years to double.

Original Investment	Interest rate	Do the Calculation	# of Years to Double	
$ 2,000.00	2	72/2=	36	
$ 2,000.00	4	72/4=		
$ 2,000.00	6	72/6=		
$ 2,000.00	8	72/8=		
$ 2,000.00	10	72/10=		
$ 2,000.00	20	72/20=		
$ 2,000.00	24	72/24=		

Question 1: What pattern do you see developing?

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Question 2: What interest rate can you expect to get if you put money into a savings account?

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Question 3: What interest rate can you expect to pay if you borrow money to purchase a car?

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Question 4: Where do financial institutions generally get the money to lend to their clients?

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***Second,* how can the "Rule of 72" benefit you—help you achieve financial wellness?** If you invest wisely over the long term, compound interest will benefit you by growing your money.

Question: What would happen if your parents put $2,000.00 into an investment for you when you were born? How long would it take your investment to double? How much would it be worth if you decided to take it out at age 72?

Watch the exponential growth by calculating the Rule of 72 for each percent rate and then by doubling the investment based on the doubling period. The first column is done for you. You will notice that because 72/2 is 36, the doubling period for a 2% interest rate is 36 years. Therefore, the money doubles every 36 years, and by the time you have turned 72, the investment is worth $8,000.00.

Think: What do you predict will happen with an interest rate of 4% or 8%?

Do: The first column is done for you (note: not all cells will be filled under each column). Complete the last two columns.

AGE	2 percent	4 percent	8 percent
	72/2=36	72/4=	72/8=
0	$ 2,000.00	$ 2,000.00	$ 2,000.00
9			
18			
27			
36	$ 4,000.00		
45			
54			
63			
72	$ 8,000.00		

Do note that this activity is based on a ***one-time $2,000.00 investment***. If you added money each month, the investment would grow at an even greater rate. The key is "leaving it alone to grow over time"; this is the "magic" of the "Rule of 72," the magic of **compounding interest**!

Third, how can the "Rule of 72" harm you?

Now we're getting serious! Many credit cards charge 28.8 percent on unpaid balances, but for this challenge, let's see what happens with a lower rate of 24%. For the purposes of this activity, we are going to assume that you (a savvy 16-year-old) purchased a new computer for $2,000.00 when you were 16, charged it to your brand new credit card, but then you forgot about it and never made a payment. Finally, the credit card company catches up with you when you're 49, and they hand you a bill.

Think: How much would you owe them?

Do: Complete the chart and you will find out! But ***be prepared for the scare of your life***!

AGE	24% Interst Rate: 72/24=3		
16	$ 2,000.00		

Think: Just out of curiosity, how much would the computer be worth?

Finally, what did you learn from this process and how will it affect your future financial

planning?

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