Power Tools for Building Wealth
Budget your way to debt free living

Wealth is an interesting word, but what exactly does it mean and what is the key to obtaining it? Perhaps some windfall of good fortune or having a brilliant idea that makes you lots of money? The key to being a wealthy person is not a mystery. A truly wealthy person (not just someone that poses as wealthy, but is actually deep in debt) is one who spends **less money** than s/he earns.

A rich person may have a lot of money available, but may not actually be wealthy. If a person spends money at a rate faster than earning it, then eventually, that pile of money stashed away will soon disappear. Wealthy people, on the other hand, spend less money than they earn so their money will grow.

If your expenses are less than your income, it will be easier to work toward a goal of achieving wealth. So how do you make that happen? The first step is knowing exactly where you are monetarily. An honest analysis of your expenses and income is the first step. Only then will you know how far you are from spending less than you earn. Step two will be to reduce your spending and increase your earnings. You'll see this is very similar to the process used to create a budget. A budget is a spending plan designed to cover your needs, provide for your "wants," and put you on the path to wealth.

Create a Budget
Start by comparing your expenses to your monthly income, but be honest about it. Make a list of your recurring expenses, including those for entertainment. And of course, don't forget the payments you make to reduce debt. Do your expenses exceed your income? If so, where can you cut down to stop spending more than your monthly income?

Review and Edit Your Budget
As circumstances change, such as income and expenses, so will your budget. Get used to living within a budget, but don't get too comfortable. Keeping a close eye on the delicate balance between expenses and income will keep you on the path to wealth.

The Budget Power Tool
An honest budget you can live with will be a powerful tool to help build wealth. Your budget will become more effective as you continue to edit it based on your changing needs and your self-discipline to stay with it.

Debt doesn't have to be forever. Eliminating it will make a big difference in your quest toward wealth. Use your budget to eliminate one debt at a time. When a single debt is eliminated, take the income you were using to service that debt, and apply it to the next. Applying the funds you have budgeted for debt reduction in a focused, deliberate way will help you pay off debts more quickly. As your budgeting skills improve, you'll have more success paying off debts.

Two Strategies – One Goal
There are two different strategies that can be used to reduce and eliminate debt: **mathematical strategy** and **psychological strategy**. Both advocate paying off debts completely; however, each strategy suggests paying them in a different order. Each strategy is effective, but find the one that works best for you. To help choose a strategy, you'll try each one on the following example. Each method relies on a calculation that determines a minimum monthly payment required to pay off a balance in a certain amount of time. Here is the formula and an example of how it works.

The formula to calculate the monthly payment on an original principal loan amount **(P)** at an annual interest rate **(I)** that will be necessary to pay off the entire loan in **(N)** months, might look like this:

$$MonthlyPayment = \frac{(P \times (I \div 12))}{(1-(1+(I \div 12))^{-N})}$$

P = Principal amount of the loan

I = Interest rate of the loan

N = Number of months to pay off the loan

Example:

What is the minimum payment required to pay off a $2,000 debt at 6 percent interest in four years?

P = 2,000 I = .06 N = 4 x 12 = 48

$$\begin{aligned} MonthlyPayment = \frac{(P \times (I \div 12))}{(1-(1+(I \div 12))^{-N})} &= \frac{(2000 \times (.06 \div 12))}{(1-(1+(.06 \div 12))^{-48})} \\ &= \frac{(2000 \times .005)}{(1-(1+.005)^{-48}} \\ &= \frac{(10)}{((1-(1.005)^{-48}} \\ &= \frac{(10)}{(1-.78709)} \\ &= \frac{(10)}{0.21291} = 46.97 \end{aligned}$$

A minimum of $46.97 is required to pay off this debt in four years.

<u>Mathematical Strategy</u>

Almost any financial advisor will suggest this approach to debt elimination. This strategy advises paying off debts by focusing on the <u>debt with the highest interest rate first</u>, then the next highest. This method makes mathematical sense because it focuses effort on the debts that cost the most money in interest and eliminating them. Here's an example:

"Taylor awakes one morning to realize that she's out of college, but she's in debt and needs to do something about it. She commits $700.00/month of her budget to eliminate her debt. She might be facing the following hypothetical debts."

- $20,000 college loan at 5 percent interest
- $8,000 credit card balance at 12 percent interest
- $2,000 computer loan at 10 percent interest
- $3,000 car loan at 4 percent interest

Using the mathematical approach, Taylor would pay her debts in this order:

- $8,000 credit card balance at 12 percent interest
- $2,000 computer loan at 10 percent interest
- $20,000 college loan at 5 percent interest

- $3,000 car loan at 4 percent interest

Paying her debts in this order, Taylor minimizes the total she will eventually pay in interest. The end result has her paying off the debts for the least amount of money.

Let's do a few calculations:

What is Taylor's minimum required payment on these debts assuming each debt can be paid over 10 years?

- $8,000 at 12 percent interest will be $114.78/month
- $2,000 at 10 percent interest will be $26.43/month
- $20,000 at 5 percent interest will be $212.13/month
- $3,000 at 4 percent interest will be $30.37/month

  Total minimum required payment will be $383.71 each month.

Taylor is required to pay a minimum of $383.71/month on her debts. She has dedicated $700.00/month toward those debts. Therefore, she has $316.29 more than she needs, which she can put against the debt with the highest interest rate.

Procedure to eliminate these four debts using the mathematical approach:

1. Taylor combines the $114.78 monthly minimum on the $8,000 debt at 12 percent interest with the extra $316.29 she has dedicated toward debt elimination, making her monthly payment $431.07. Paying $431.07 against this debt will eliminate the entire $8,000 in 21 months. Taylor will have paid a total of $893.89 in interest on this debt.

2. Having eliminated the $8,000 debt, she will now turn her attention to the debt with the second highest interest rate: the $2,000 computer loan at 10 percent interest. Taylor has been paying the minimum on this loan for 21 months and will have paid $331.98 in interest. Beginning month 22, the balance will be $1,776.94. She adds $431.07 that she was paying toward the $8,000 loan to the $26.43 she has been paying toward this $2,000 loan, giving her a new monthly payment of $457.50. With this new payment, the loan will be eliminated in another four months! At that time, she will have paid an additional $36.97 in interest, making her total interest paid on this loan $368.95. It has been 25 months since Taylor implemented this plan.

3. Now, on to the $20,000 loan at 5 percent interest. She has been paying the minimum of $212.13 on this loan for 25 months paying $1,917.07 in interest, leaving a balance of $16,613.80. Taylor adds the $457.50 she has been paying toward the $2,000 loan to the $212.13 she has been paying for 25 months, giving her a new monthly payment of $669.63. This loan will now be eliminated in an additional 27 months, and she will have paid an additional $959.69 in interest, bringing her total interest paid on this debt to $2,876.76.

4. Finally, Taylor's last debt is a $3,000 loan at 4 percent interest, which she has been paying for 52 months. She has paid $424.74 in interest, and is left with a balance of $1,845.31. Applying the entire $700.00/month to this single debt will eliminate it in three payments. She will have paid an additional $11.51 in interest, bringing her total interest paid on this debt to $436.25.

Using the **mathematical approach**, paying off the debts from highest to lowest interest rate took 55 months (about 4.6 years) and cost Taylor $4,575.85 in interest.

Psychological Strategy

The psychological strategy to debt elimination is similar to the mathematical strategy in that it advocates focusing on one debt at a time, throwing everything you have toward that debt until it is gone and then moving to the next until all debt is eliminated.

However, if you notice in the example, the first step took 21 months before the first debt was eliminated. For some, achieving success sooner rather than later gives them the psychological reinforcement they may need to stay on track. For some, behavior modification is more important than saving extra interest.

The psychological strategy is also known as the debt snowball approach. With this approach you ignore interest rates when determining the order in which you'll pay off your debt and order the debts from smallest to highest balance.

This should get those small debts paid off quickly, so you start to see your plan is working. With this approach, using the same example as we were using for the mathematical approach, Taylor would pay off her debts in this order:

- $2,000 computer loan at 10 percent interest
- $3,000 car loan at 4 percent interest
- $8,000 credit card balance at 12 percent interest
- $20,000 college loan at 5 percent interest

By paying off debts in this order, Taylor eliminates the smallest balance in the quickest time giving her a sense of accomplishment. This approach will eventually cost Taylor more in total interest paid, but shows her plan is working, which may be the difference between success and failure.

Taylor's minimum required payments on these debts, assuming each debt can be paid over a 10-year period, are the same as in the previous example:

- $2,000 at 10 percent interest will be $26.43/month
- $3,000 at 4 percent interest will be $30.37/month
- $8,000 at 12 percent interest will be $114.78/month
- $20,000 at 5 percent interest will be $212.13/month

Total minimum required payment will be $383.71 each month.

Taylor is required to pay a minimum of $383.71/month on her debts. She has dedicated $700.00/month toward debt reduction. Therefore, Taylor has $316.29 more than she needs to cover the minimum required payment, and she can now focus on the debt with the smallest balance first.

1. Taylor combines the $26.43 monthly minimum on the $2,000 debt at 10 percent interest with the extra $316.29 she has dedicated toward debt elimination, giving her a monthly payment of $342.72. Paying $342.72 against the $2,000 debt will eliminate it in seven months. Taylor will have paid a total of $58.81 in interest on this debt.

2. Having eliminated the $2,000 debt, Taylor will now turn her attention to the debt with the second lowest balance: the $3,000 car loan at 4 percent interest. She has been paying the minimum on this loan for seven months already and will have paid $68.57 in interest. The balance, beginning in month eight will be $2,855.95. Taylor adds the $342.72 that she was paying toward the $2,000 loan to the $30.37 she has been paying toward the $3,000 loan, giving her a new monthly payment of $373.09. With this new payment, the loan will be eliminated in another eight months!

At that time, Taylor will have paid an additional $42.00 in interest, so her total interest paid on this loan will be $110.57. It has now been 15 months since Taylor implemented this plan.

3. Now, on to the $8,000 loan at 12 percent interest. She has been paying the minimum of $114.78 on this loan for 15 months paying $1,161.85 in interest and leaving a balance of $7,440.20. She adds the $373.09 she has been paying toward the $3,000 loan to the $114.78 she has been paying for 15 months, giving her a new monthly payment of $487.87. This loan will now be eliminated in an additional 17 months, and Taylor will have paid an additional $673.40 in interest bringing her total interest paid on this debt to $1,835.25.

4. Taylor's last debt is a $20,000 loan at 5 percent interest, which she has been paying now for 32 months. She has paid $2,389.05 in interest, and is left with a balance of $15,600.86. Applying the entire $700.00/month to this single debt will eliminate the debt in 24 more payments. Taylor will have paid an additional $807.03 in interest bringing her total interest paid on this debt to $3,196.08.

Using the **psychological strategy**, paying off the debts in order from lowest to highest balance took 56 months (about 4.7 years) and cost Taylor $5,200.71 in total interest.

Mathematical Strategy		**Psychological Strategy**	
Months	**Interest Paid**	**Months**	**Interest Paid**
55	$4,575.85	56	$5,200.71

Two Approaches, One Goal

When the two strategies are compared the time difference is small, but there is a monetary difference of **$624.86**. As we stated, the psychological strategy is more costly, but Taylor started seeing debts eliminated at a much quicker pace. Some would argue that the $624.86 could be considered wasted using this method. Others would argue that arriving at success more quickly is just the boost Taylor may need to stay on track. What do you think?

Regardless of the approach, the goal is the same: eliminating debt. Both methods accomplish the same goal, so no matter which approach works best for you, make a plan and stick to it!

Acknowledgments

The calculations presented here were done using an online loan minimum payment calculator and amortization. It would take considerable time to calculate months of data and arrive at accurate figures without one. Thanks to Bankrate.com for their assistance. Access the same calculator at: http://www.bankrate.com/calculators/mortgages/loan-calculator.aspx.