

Financial Literacy for Teens





Financial Literacy for Teens

Zoom Seminar - Free for ALL!

Topics covered:

- Budgeting
- Checking and savings accounts
- Credit and debt
- Education ROI
- Education and financial aid
- Exploring internships and jobs
- Insurance basics

July 27th

3-4 P.M.

Link: [https://](https://us02web.zoom.us/j/82231412677?pwd=vnxc0EHbVXjS5havoWFSRMrDLvEqWP.1)

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Questions? Contact organizers at
albany@apapa.org

Profile – Jeyamarippan Ganapathy, CFA

- ❖ Active Social contributor to Kiva.org/Himalayan cataract project/promise of pencil/<http://www.girlswhoinvest.org>
- ❖ Lead Mentor at Startups-Ignite accelerator, <https://www.startups-ignite.com> and part of board of advisors in startups in Washington DC area
- ❖ Chartered Financial Analyst (CFA)
- ❖ Founded Samatva Wealth Management LLC (www.samatva.us) , Registered Investment Advisor
- ❖ Graduated MBA (Finance) Degree from Johns Hopkins university, Maryland/USA
- ❖ Systems Development Director, Xerox Corporation
- ❖ Master of engineering from PSG college of Technology, Coimbatore, India
- ❖ Bachelor of Electrical and Electronics Engineering from Coimbatore Institute of Technology, India
- ❖ Native/School - Elayirampannai (near Madurai), Tamilnadu/India

Introduction to Budgeting

- Budgeting is like a game where you plan how to spend and save your money.
- It's about making sure you have enough money for the things you need and want.



The 3-Part Budget Rule

- **Spend:** Use some of your money for things you need or want.
- **Save:** Put some money aside for future needs or big goals.
- **Share:** Give some money to help others or support a cause you care about.

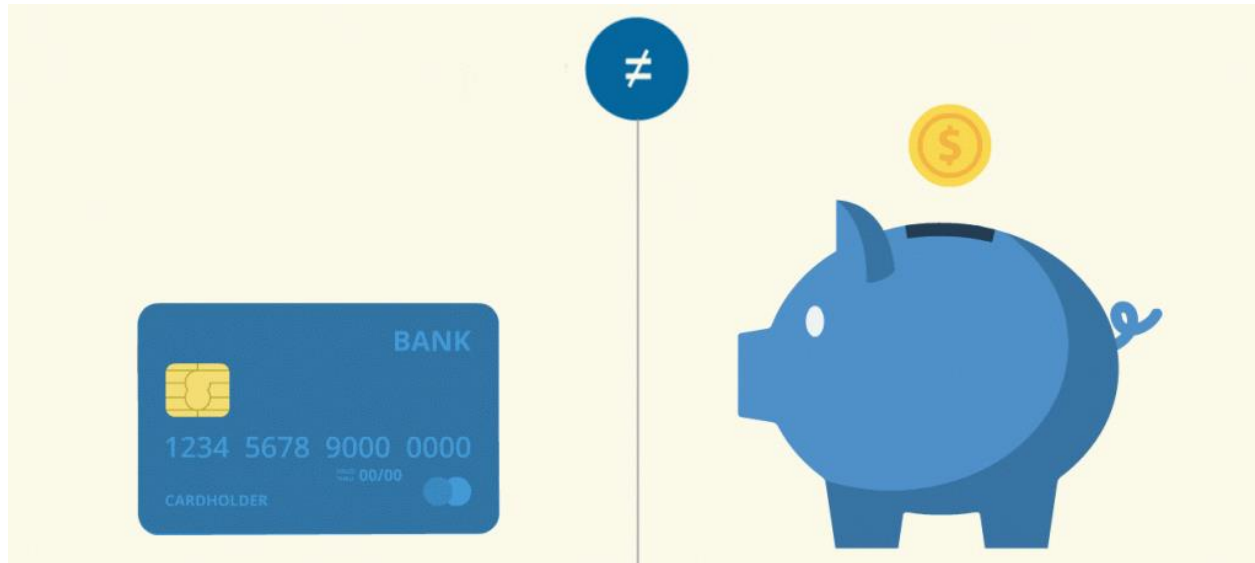


Budget

- Your Savings = Personal Income – Personal Expenses

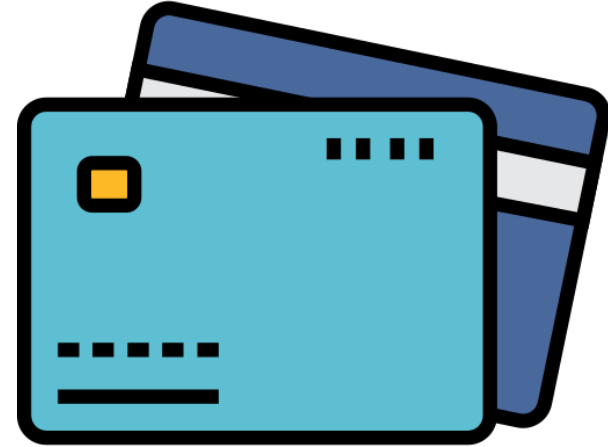
**NEVER SPEND MORE THAN
WHAT YOU EARN**

Checking and Savings Accounts



Checking Account

- Allows quick access to funds
- Can easily access these funds through a debit card
- It is important to keep track of the amount in the account to prevent canceled transactions and overdraft fees
- Can access ATMs



Savings Account



- A safe place to store your money
- No debit card
- It is a smart practice to allocate 5-10% of your paycheck into your savings account
- Banks give savers an interest called APY (annual percentage yield)
- Transfer Fees: Certain banks will charge a fee if you transfer money out of the savings account more than a certain amount of times

How to effectively use checking and savings accounts

- Keep an eye on your balance
- Maintain a budget regularly
- Explore beneficial bank accounts
 - Especially ones that pay higher interest
- Be wary of using your debit card
 - Account information
 - Benefits of using a credit card
- Know about fees (overdraft, transfer, etc.)



Peer-to-Peer Payment Systems

What are P2P Payment Systems?

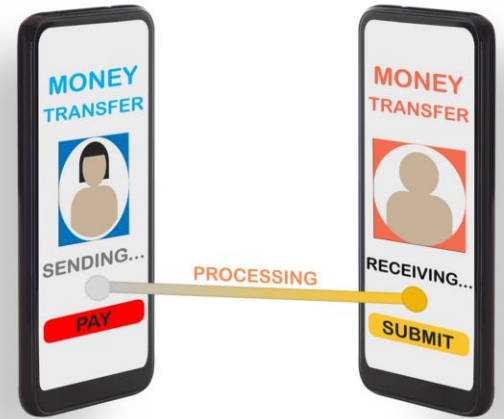
- Digital platforms for transferring money directly between individuals.
- Examples: Venmo, PayPal, Cash App, Zelle.

How P2P Payments Work:

- Link to bank accounts, debit cards, or credit cards.
- Send and receive money instantly or within a few hours.

Common Uses:

- Splitting bills with friends or roommates.
- Paying for services (e.g., babysitting, freelance work).
- Sending gifts or financial support to family.



Peer-to-Peer Payment Fraud



- Strangers can trick you into sending money or personal information
- Money is transferred immediately and there is usually no way to get it back
- Methods of scamming and fraud
 - Phishing scams: Scammers pose as a P2P app employee and send you a malicious email or text message
 - Unauthorized money transfers: Someone accesses your account and moves money out of your account without your knowledge
 - “Accidental” transfers: Receive a payment from a stranger who claims the transfer was a mistake

How to protect yourself from P2P fraud

- Never send or accept P2P payments from someone you don't know
- Double-check the information of the person you are sending money to
- Make sure your bank or P2P payment app is up to date
- If you are a victim of fraud, notify your P2P platform and bank immediately
- When calling a P2P app customer service line, never provide sensitive information over the phone



What is Credit?

- **Borrow money to pay back later:** Allows you to make purchases or withdraw cash and pay it back over time.
- **Comes with interest and fees:** Interest is charged on the borrowed amount; additional fees may include late payment fees, annual fees, etc.
- **Involves a set credit limit:** Maximum amount you can borrow, determined by the lender based on your creditworthiness.
- **Requires a credit history and score:** A record of your borrowing and repayment behavior, influencing your ability to get loans and credit cards.



What is Debt?

- **Money owed:** Funds that you have borrowed and must repay.
- **Types of debt:** Includes credit card debt, student loans, mortgages, and personal loans.
- **Interest accumulation:** The cost of borrowing money, which can significantly increase the amount owed over time.
- **Repayment terms:** Conditions under which the debt must be repaid, including the repayment schedule and interest rate.



Advantages and Disadvantages of Credit

Pros of Using Credit:

- **Builds credit history:** Positive credit use improves your credit score, which is important for future borrowing.
- **Access to funds:** Credit provides immediate access to funds for large or unexpected expenses.
- **Rewards and perks:** Many credit cards offer cashback, points, or travel rewards.
- **Purchase protection:** Credit cards often offer protection against fraud and unauthorized charges.



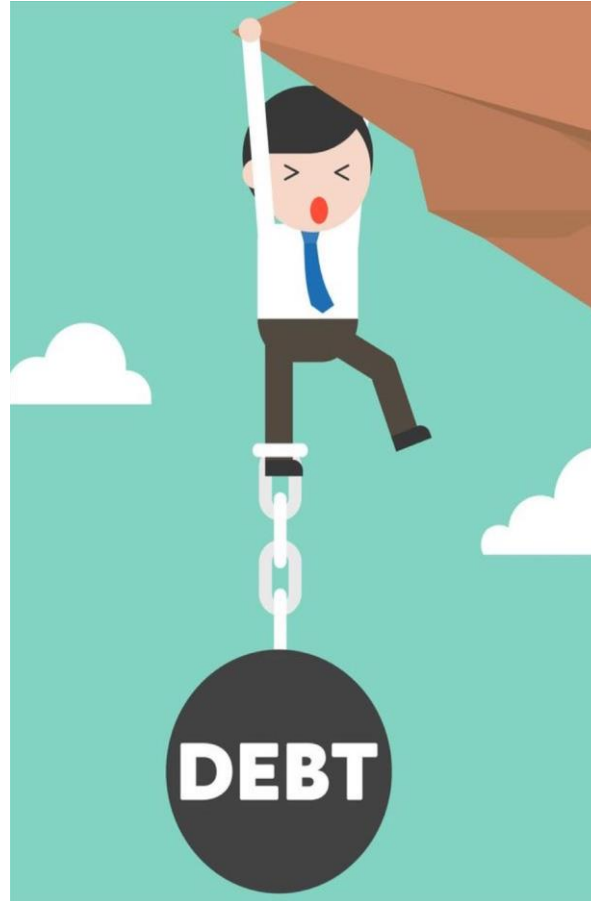
Cons of Using Credit:

- **Potential for high interest:** Carrying a balance can result in high-interest charges.
- **Debt accumulation:** Easy access to credit can lead to overspending and significant debt.
- **Fees:** Credit cards may have annual fees, late payment fees, and other charges.
 - **Impact on credit score:** Missed payments or high credit utilization can negatively affect your credit score.

Advantages and Disadvantages of Debt

Pros of Using Debt:

- **Achieve financial goals:** Loans can help you buy a home, pay for education, or start a business.
- **Manage large expenses:** Spreads the cost of big purchases over time, making them more affordable.
- **Credit score improvement:** Responsible debt management can improve your credit score.
- **Tax benefits:** Some types of debt, like mortgage interest, can be tax-deductible.



Cons of Using Debt:

- **Financial strain:** Monthly debt payments can strain your budget.
- **Interest costs:** Interest payments increase the total amount you repay.
- **Risk of default:** Failure to repay can lead to legal action and damage your credit score.
- **Debt cycle:** Reliance on debt can lead to a cycle of borrowing and repayment, making it hard to become debt-free.

Tips for Managing Credit and Debt

Managing Credit Wisely:

- **Pay off balances monthly:**
Avoid interest charges by paying your credit card bill in full each month.
- **Monitor your credit score:**
Regularly check your credit report for accuracy and track your score.
- **Use credit responsibly:** Only charge what you can afford to pay off to avoid debt accumulation.
- **Keep credit utilization low:** Use less than 30% of your credit limit to maintain a good credit score.



Managing Debt Wisely:

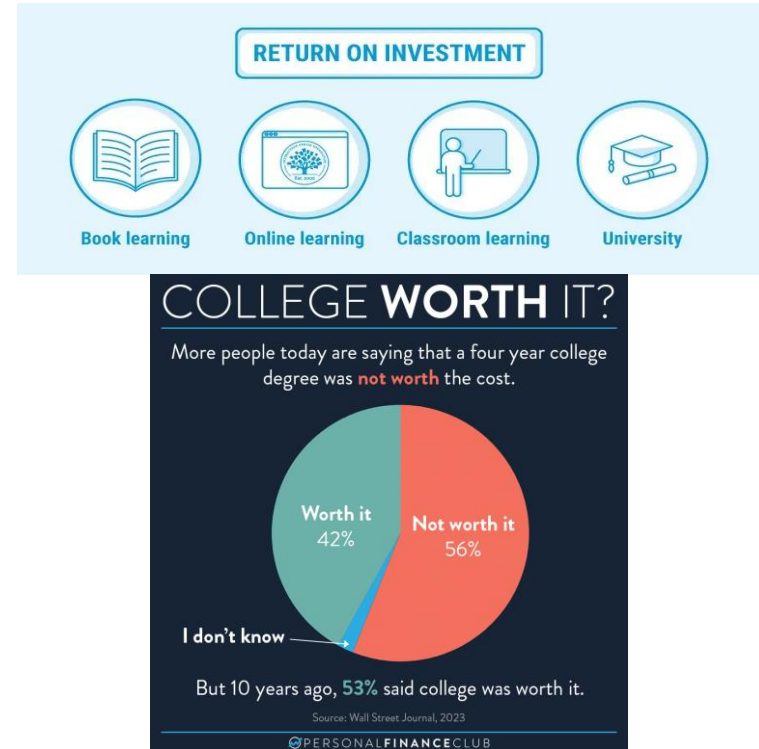
- **Create a repayment plan:**
Prioritize paying off high-interest debt first.
- **Stick to a budget:** Plan your spending to ensure you can make debt payments on time.
- **Avoid new debt:** Limit taking on new debt until existing debt is under control.
- **Seek help if needed:**
Consult a financial advisor or credit counselor if you're struggling with debt.

Education ROI



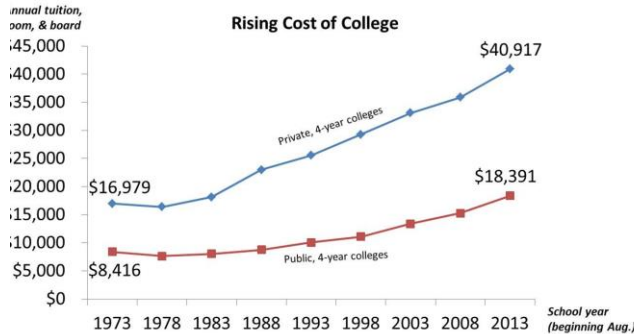
What is Education ROI

- Return on Investment for higher education such as college or trade school
- Important for choosing what to major/field to pursue
- Quantitative/Qualitative Assessment



Quantitative

$$\text{ROI (\%)} = \frac{\text{Total Revenue} - \text{Total Cost}}{\text{Total Cost}} \times 100$$



- Total Revenue = Average Salary For Job Type * Period of Time (20-30 years)
- Total Cost = Tuition + Housing + Books/Supplies (Use in general values)
- Formula does not account for raises throughout career, interest payments, or inflation but shows general idea

Qualitative Assessment of Colleges

- Job opportunities and career paths from major
- Alumni network/Mentor Resources
- Learning opportunities outside classes (research, projects, clubs)
- Location
- Community Values/Comradery



College financial planning - Tuition and living expenses

Current year 2023-2024 college costs

- In-state 4 year degree : \$125,000 (+ or – 20%)
- Out of state : \$240,000 (+ or – 20%)
- Top Private or IVY : \$300,000 (+ or – 20%)

Value of \$100,000 investment in index funds by the time your kids reach their retirement age **\$2 million**

Most Valuable Majors



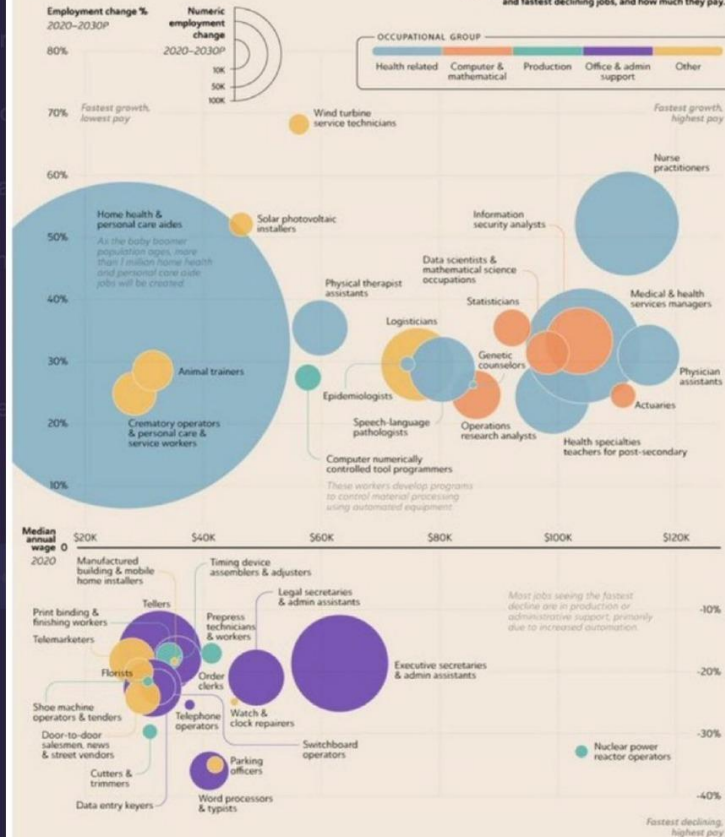
Technology Disruption in the next 20 years

- ❖ AI-ML - Artificial intelligence / Machine Learning (Synthetic data – needed to train the machines) – ChatGPT (OpenAI)
 - ❖ Self driving vehicles & EV
 - ❖ 10G
 - ❖ Cloud computing (AWS, AZURE, IBM, Google)
 - ❖ Internet of things (IoT)
 - ❖ Digital Payments
 - ❖ Digital assets/ Digital Banking (Fin Techs)
 - ❖ Genome sequencing
 - ❖ Gene editing
 - ❖ Quantum computing (super position/ Rigetti)
 - ❖ Robotics surgery
 - ❖ 3D printing
 - ❖ Increase human immortality
 - ❖ Drones
 - ❖ Blockchain
 - ❖ Hyperloop
 - ❖ Flying cars
 - ❖ Aerospace/satellite /Space Travel
 - ❖ Solar/Wind/Battery backup power/Fuel cell
 - ❖ others.....
- Very high probability that you may be working in one of these technology or the technology that may not have been invented yet
- Women are underrepresented in Technology & Business & Finance

The 20 Fastest Growing + Declining Jobs

OVER THE NEXT DECADE

The U.S. Bureau of Labor Statistics predicts that 11.9 million new jobs will be created from 2020 to 2030—a growth rate of 7.7%. Below, we show the fastest growing and fastest declining jobs, and how much they pay.



Source: U.S. Bureau of Labor Statistics

Note: The fastest growing occupation data excludes occupations with above average cyclical recovery due to the COVID-19 pandemic rather than structural growth.

Final Notes



Educational and Financial Aid



Defining Financial Aid

- Any federal, state, institutional, and private monetary funding and resources to help
- Students and families pay for their college expenses.
- Comes in the form of grants, scholarships,
- Loans and student employment



Fast Fact



- Fill out the FAFSA even if you don't want loans.
- When you fill out the FAFSA, you are applying for federal and state funds, as well as awards from your school. These can include grants and scholarships in addition to federal loans.
- **Financial aid is first come, first serve, so file early!**

FAFSA must be completed each year your enrolled in college

Types of Aid

- **Grants**- Gift aid; does not have to be repaid. Most often awarded on the basis of need
- **Scholarships**- A form of “gift aid,” does not have to be paid back. Awarded on the basis of academic, artistic, athletics or other merit attribute
- **Loans**- Must be repaid. Ex: Federal loans, Privately financed loans. Terms vary significantly by program. Borrow wisely. Is it a good investment?



Over 60% of financial aid awarded is in the form of federal loans. Too many families assume that any type of “award” is free money.

There are generally three types of awards: grants, scholarships and loans. Student loans need to be paid back and you will have to pay interest.

Cost of Attendance



- Tuition Fees (Billed by College)
- On-Campus Dorms/ Housing (Billed by College)
- Books and Supplies (Not Billed by College)
- Personal Expenses (Not Billed by College)
- Transportation and Off-Campus Housing (Not Billed by College)

Fast Fact



Net Price is the amount that a student pays to attend an institution in a academic year **after** subtracting scholarships and grants the student receives.
Focus on the **net price**. Not the **sticker price**

Net Price Calculator

- Available on the college's website.
- Knowing your net price: Gives you the best idea of what you'll pay for a particular college
- Makes comparing colleges easier
- Widens your choice of colleges
(Answer the questions as accurately as possible)
- Remember that information generated is just an estimate and the actual cost may end up higher or lower than the estimate provided by the net price calculator



Expected Family Contribution (EFC)

An index that measures the **financial strength of your family** and is calculated using your family's taxed and untaxed income, assets, benefits (such as unemployment or Social Security), family size, and number of family members who will attend college. **EFC does not change based on college you attend.**



Calculating Financial Need

Calculating Financial Aid

How do the colleges determine if my student is eligible?



Student Loan Interest Rates & Stafford Loans

Year	Undergraduate Direct Loan	Graduate Direct Loan	PLUS Loans
2024 - 2025	6.533%	8.083%	9.083%
2023 - 2024	5.498%	7.048%	8.048%
2022 - 2023	4.993%	6.543%	7.543%
2021 - 2022	3.734%	5.284%	6.284%
2020 - 2021	2.750%	4.300%	5.300%

Grade Level	Dependent Undergraduate Student	Independent Undergraduate Student
Freshman	\$5,500 (max \$3,500 subsidized)	\$9,500 (max \$3,500 subsidized)
Sophomore	\$6,500 (max \$4,500 subsidized)	\$10,500 (max \$4,500 subsidized)
Juniors, Seniors and Beyond	\$7,500 (max \$5,500 subsidized)	\$12,500 (max \$5,500 subsidized)
Cumulative Limit	\$31,000 (max \$23,000 subsidized)	\$57,500 (max \$23,000 subsidized)

‘Early College’ Programs

- Also referred to as “**dual enrollment**”
- Allows high school students to earn a high school diploma and a college certificate or **associate's degree** at the same time.
- Can reduce the cost of a bachelor's degree by up to half, and can also help students avoid taking out as many student loans.
- On average, early college graduates earn 38 college credits for free, which can save them **30% on a bachelor's degree** or 60% on an associate degree.



**GRANTS &
SCHOLARSHIPS**

LOAN OPTIONS



SAVE MONEY

WORK-STUDY

Scholarship Lists

- Scholarship.com
- Cappex
- Chegg
- CollegeBoard
- CollegeGreenLight
- Fastweb
- Niche
- GoingMerry
- Peterson's
- CollegeVine

Check with school guidance office for local/state based scholarships for STEM/Minority and any niche areas

Tips and Suggestions

- Keep track of important date and deadlines- admissions and financial aid.
- Complete financial aid applications early.
- Never pay for financial aid applications and scholarships. (Ex: NSHSS)
- Use the IRS Data Retrieval Tool on FAFSA, if available.
- Search and apply for scholarships. Scholarships takes both work and luck.
- Take advantage of resources to help plan for college and finances
- Federal Student Aid (<https://studentaid.ed.gov>)
- College Board BigFuture (<https://bigfuture.collegeboard.org>)
- Start with grants and scholarship resources before loans
- Minimize loan borrowing if you use them
- Federal loans before private
- Contact college's Financial Aid Office with any questions or concerns

Avoid FAFSA.com!!!



"Become a client of the nation's oldest and largest student aid advisory service for as little as 79.99."

Don't pay for a process that was designed to be FREE!



STEP BY STEP FASFA GUIDE

Insurance Basics



What is Insurance?

- Unexpected injuries/ accidents are stressful and painful itself but they also come with expensive bills
- Insurance acts as a safety net during this time
- Pay in small regular amounts
- Insurance covers costs for unexpected incidents
- Shields your savings from significant unexpected expenses



Key Concepts of Insurance



- **Premium:** The amount paid regularly (monthly or annually) to maintain active insurance.
- **Policy:** The contract between you and the insurance company, specifying covered risks and their extent.
- **Claim:** Process of filing for compensation or services to cover losses as defined in the policy.

Types of Insurance

- **Health Insurance:** Covers medical expenses.
- **Car Insurance:** Covers damages resulting from car accidents.
- **Homeowner's Insurance:** Protects your home and belongings from damage or theft.
- **Life Insurance:** plan that gives money to your family if you pass away
- **Term Insurance:** coverage for a set time that pays out if you die within that period



How does Insurance work?

- **Initiating a Claim:** Report an accident to your insurance company.
- **Claim Review:** The company checks if the accident is covered under your policy.
- **Payment Process:** Insurance pays for car repairs, less the deductible (a predetermined out-of-pocket amount).



Personal development Guidance

- Develop your personal skills in the next 4 to 6 years before your college graduation
- Build your networking contacts
 - Attend startup or any business events near your area whenever you have an opportunity
 - Collect business cards/phone number/email address/linkedin profile from the people you meet at the networking event
 - Connect with them through email or linkedin
 - Develop networking through friendship approach
- Find internship opportunities and work during summer breaks and explore your real interests
- Develop your communication skills (Reading, Writing and Verbal)
(<https://www.toastmasters.org/>)
- Participate in school/College Team/Group projects and always provide your best contribution

Internship opportunities

- <https://inroads.org/> / <https://www.apapa.org/internship>
- Business/Finance: Reach out to Hedge funds, wealth management / financial services/Banks, insurance firms and brokerage firms in your area
- Technology: Attend startup or entrepreneur events near to your area and find out potential internship opportunities from the new startups.
- Govt. / Health sector – NIH and NIST
- Non-profit organizations
- Marketing - Digital Marketing / Social Marketing firms
- Medical – Doctor offices, Physical therapies offices etc
- Virtual internships (<https://www.volunteermatch.org/virtual-volunteering>)

Exploring Internships and Jobs

- Internship/Job Opportunities are found through networking
- Attend industry emerging programs in your college
- LinkedIn and Email are most common
- Learn how to spend Cold Email/Message
- Network within your school with teachers and students
- Apply, Apply, Apply



High School Government Internships

- House of Representatives House Page Internship
- AFRL Scholars (Aerospace)
- NYC Office of Mayor Internship
- NASA Internships for Stem
- US Treasury Headquarters Student Internship Program
- National Institute of Health High School Summer Program



National Institutes
of Health

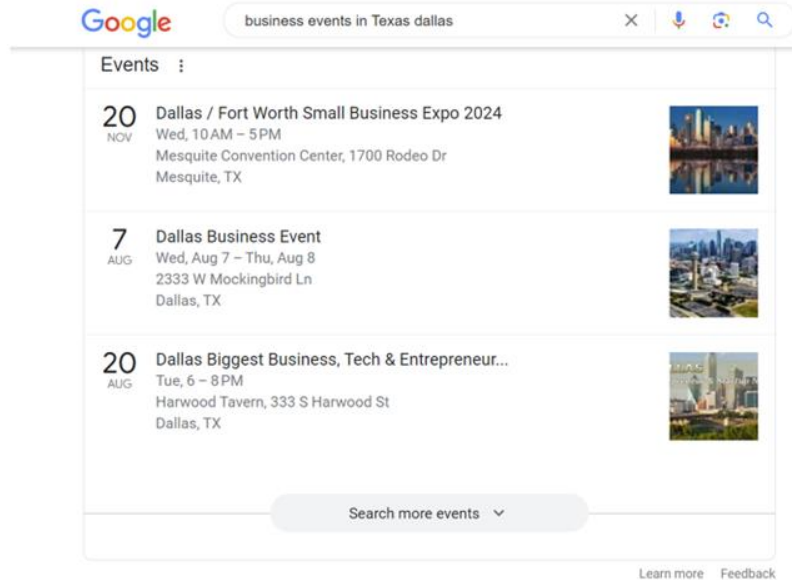
Websites for Internships

- CollegeVine
- Chegg Internships
- Handshake
- NASA
- Indeed
- LinkedIn
- The Library of Congress/Go Government (STEM)

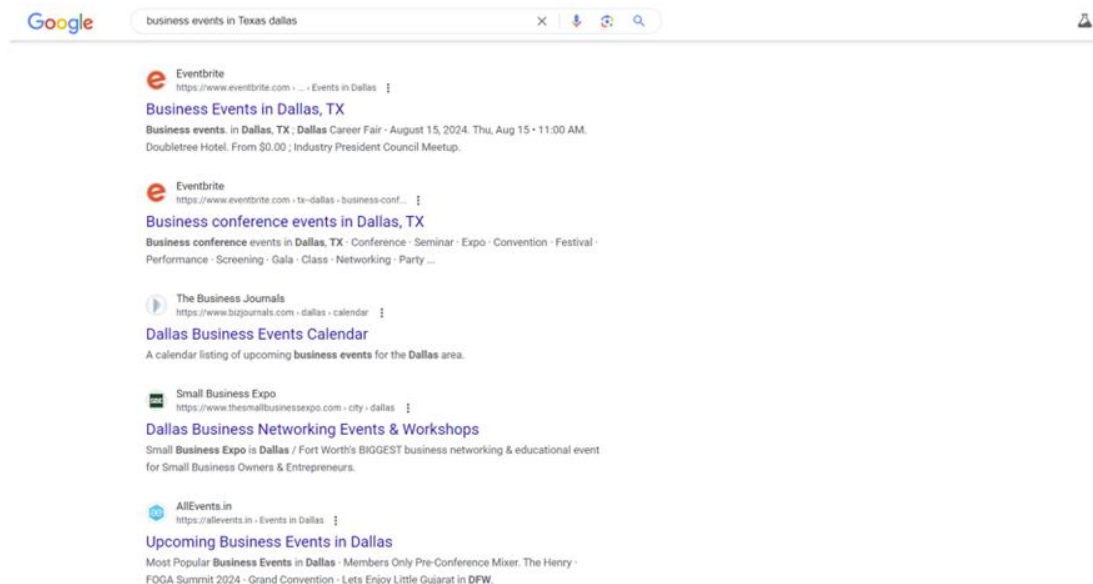


How to find out events?

- Simple Google search



How to find out the events?



A screenshot of a Google search results page for the query "business events in Texas dallas". The search bar at the top shows the query and standard search icons. Below the search bar, five search results are listed, each with a logo, the source name, a URL, a title, and a brief description.

Google

business events in Texas dallas

Eventbrite
<https://www.eventbrite.com> · ... · Events in Dallas
Business Events in Dallas, TX
Business events in Dallas, TX · Dallas Career Fair · August 15, 2024 · Thu, Aug 15 · 11:00 AM.
Doubletree Hotel. From \$0.00 · Industry President Council Meetup.

Eventbrite
<https://www.eventbrite.com> · tx-dallas · business-conf...
Business conference events in Dallas, TX
Business conference events in Dallas, TX · Conference · Seminar · Expo · Convention · Festival ·
Performance · Screening · Gala · Class · Networking · Party ...

The Business Journals
<https://www.bizjournals.com> · dallas · calendar
Dallas Business Events Calendar
A calendar listing of upcoming business events for the Dallas area.

Small Business Expo
<https://www.thsmallbusinessexpo.com> · city · dallas
Dallas Business Networking Events & Workshops
Small Business Expo is Dallas / Fort Worth's BIGGEST business networking & educational event
for Small Business Owners & Entrepreneurs.

AllEvents.in
<https://allevents.in> · Events in Dallas
Upcoming Business Events in Dallas
Most Popular Business Events in Dallas · Members Only Pre-Conference Mixer. The Henry ·
FOGA Summit 2024 · Grand Convention · Lets Enjoy Little Gujarat in DFW.

Skills needed



Communication



Ability to learn
faster



Problem Solving



Ability to work in a
team and provide
great contribution



Marketing

High school courses that can help you



Psychology



Statistics



Computer
programming language
(At least one)



Economics



Personal finance



History

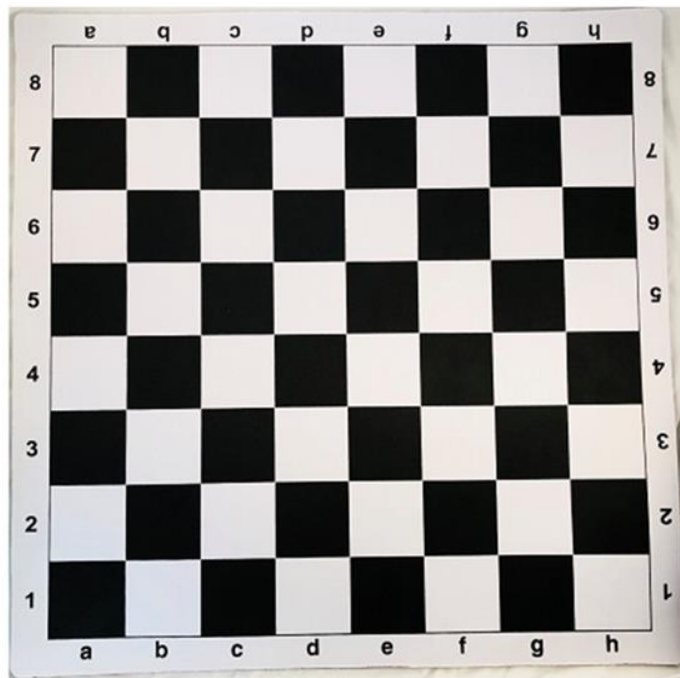


Arts



Music

Power of Compounding



Chess Board – 64 squares – Start with single rice and double it every next square

Answer

Ends with

18,446,744,073,709,551,615 =

461,168,602,000 metric tons = \$300

trillion at current prices = entire
wealth of the planet

Power of positive compounding

$$(1.00)^{365} = 1.00$$

$$(1.01)^{365} = 37.7$$

Doing nothing at all

Vs.

Small consistent effort

Help at least one person every day –
by doing so you will learn new skill or
acquire new knowledge /you will
compound your skills or knowledge at
a faster rate

Avoid overconfidence bias at all costs

- cognitive bias in which people wrongly overestimate their knowledge or ability in a specific area
- Understand your edge of competency

Conclusion

Curiosity

Patience (delayed gratification)

Persistent (never give up) and discipline

Learn from our mistakes or from other's mistake or failures

Always Keep learning (Read, Read, Read....)

If you spend 4 hrs per day on the things – 10,000 hours in 7 years

Unlearn old ideas that produce failures for you

....

...

Intelligence

Great Books for reading

- Thinking, Fast and Slow by Daniel Kahneman
- The Intelligent Investor - Benjamin Graham
- Security Analysis - Benjamin Graham
- DAMN RIGHT! Behind the scenes with Berkshire Hathaway Billionaire – Charlie Munger by Janet Lowe
- Margin of Safety - Seth Klarman
- Common Stocks and Uncommon Profits by Phil Fisher
- You Can Be a Stock Market Genius - Joel Greenblatt
- The Art of Short Selling - Kathryn Staley
- Letters to Berkshire Hathaway Shareholders - Warren Buffett - <https://www.berkshirehathaway.com/letters/letters.html>
- The Most Important Thing - Howard Marks
- Fooled by Randomness - Nassim Taleb
- 100 to 1 stock market by Thomas Phelps



Q&A

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Zoom Seminar - Free for ALL!

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**Questions? Contact organizers at
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