

1. Executive Summary

This analysis evaluates NVIDIA's financial health through a review of its **Balance Sheet, Income Statement, and Cash Flow Statement**. The main goals are to understand:

- The company's **creditworthiness**
- Its **operational efficiency**
- Its **capital allocation strategy**

A secondary goal is personal: to deepen my own understanding of how financial statements work and how investment strategies depend on these core documents.

Disclaimer:

This analysis is purely for **informational and research purposes**. I am **not certified** to recommend any investment decisions. I am simply passionate about understanding companies through their financials, and this write-up is part of my learning journey.

2. Feedback Request

This is my **first full financial analysis**, so I would really appreciate:

- Feedback on my **understanding** of the numbers
- Feedback on my **writing and explanations**

I am very open to learning and improving.

3. Approach

Instead of going line-by-line through each statement, I structured this analysis around **key questions** about NVIDIA's business and financial strength.

As I answer each question, I:

- Use data from the **balance sheet, income statement, and cash flow statement**
- Add any relevant **technical details or ratios**
- Connect the numbers back to the **business reality**

Many of the questions are inspired by discussions and books related to long-term investors such as **Warren Buffett, Charlie Munger, and Li Lu**.

Note:

- The intent is to create a **consolidated, business-focused analysis**, not three separate, disconnected sections.

Units

All numbers in the Excel file and in this analysis are divided by **1,000,000**, so they are represented in **millions**.

4. Data Criteria

- Data is **directly extracted** from the **SEC database** using **XBRL tags** via API integration.
- I tried to use **common tags**, but in some cases, what other platforms group under a label (e.g., “Current Assets”) may not match my breakdown exactly.
 - However, **Total Current Assets always match**.
- The analysis uses data from **2014 to 2025**.
- In the code, values are divided by **1,000,000**, so all numbers in Excel are reflected in **millions**.

5. Analysis

As part of this section, I will go ahead and answer some simple yet effective questions.

5.1. Does NVIDIA have enough cash to meet its debt obligations?

Short Term

- I use the **Current Ratio** to check whether current assets cover current liabilities.
 - Since **2014**, NVIDIA’s current ratio has been **> 1**, which indicates **decent liquidity**.

- However, not all current assets can be easily converted into cash.

So I:

- Exclude **Inventory (Net)**
- Focus on:
 - **Accounts Receivable**
 - **Cash & Cash Equivalents**
 - **Marketable Securities (current)**
- For this, I calculate the **Quick Ratio**:

Quick Ratio = (Accounts Receivable + Cash & Cash Equivalents + Marketable Securities) / Total Current Liabilities

- To further stress-test liquidity, I **reduced marketable securities** by:
 - 10%
 - 15%
 - 25%

Even after these stress tests, **NVIDIA's quick ratio remains above 3**, which is **excellent** and shows strong coverage for short-term debt.

5.2. Is NVIDIA hoarding cash as a one-time event or as a sustained pattern?

To answer this, I look at how much of total assets are in **cash or cash equivalents** using the **Cash Ratio**:

Cash Ratio = (Cash + Marketable Securities) / Total Assets

Findings:

- Since **2014**, this ratio has been **consistently over 20%**, meaning a good portion of assets are in cash-like form.
- From **2014 to 2020**, more than **50%** of assets were in cash equivalents.
- In recent years (post-COVID), this percentage has **decreased** and now **hovers around 30%+**.

My interpretation:

- This likely reflects **deployment of cash** to strengthen and grow the business, rather than just sitting on it.
- I explore this more when I look at **CapEx and investments** later.

5.3. Does total debt hurt cash flow? Does operating cash flow comfortably exceed debt?

Companies borrow money and pay interest, so it is important to check whether **cash and marketable securities cover interest-bearing debt**.

I use:

Net Debt (conceptually) \approx Debt Having Interest – (Cash + Marketable Securities)

Findings:

- Since **2014**, this value has been **negative**, meaning **cash exceeds debt**.
- This is a **good sign**, as the company has more cash and marketable securities than interest-bearing debt.
- The value has decreased somewhat since around **2020**, because the company has taken on more debt (and therefore pays more interest).
- However, this is **not alarming**, because **cash generated still exceeds the debt**.

5.4. *Is Accounts Receivable proportional to sales growth?*

This is important because:

- **Accounts Receivable (AR)** will (hopefully) turn into cash.
- Cash then helps fund inventory and business operations.
- Inventory, once sold, becomes new AR. It's a continuous cycle.

One question I had was: “*Why isn't AR the same as cash?*”

The answer is that they represent **different stages of liquidity**.

Findings:

- Historically, for NVIDIA, **AR is mostly greater than cash equivalents**, which suggests:
 - The company sells a lot **on credit**.
 - This isn't necessarily bad:
 - They may be **reinvesting cash** into the business.
 - **Collections might be slightly slower**, or terms more customer-friendly.

To evaluate whether this is healthy:

1. I looked at **Days Sales Outstanding (DSO)**:
 - Ideally, average AR should be used, but for simplicity I used **Net AR**.
 - For NVIDIA, DSO since around **2020** has been between **53 and 65 days**, which is **quite strong**.
2. I calculated **Receivables Turnover**:

Receivables Turnover = Revenue / Net Accounts Receivable

- Over the past few years, this has been **high**, suggesting **faster collection** of receivables.
3. I classified NVIDIA into one of three cases:
 - Case 1: AR ↑, Sales ↑, DSO ↓
 - Case 2: AR ↑, Sales ↑, DSO ↑
 - Case 3: AR ↑, Sales ↑, DSO **Stable**

Based on the data, **NVIDIA fits Case 3**, with DSO in a similar range since 2020.

Additional note:

NVIDIA does convert **AR to cash within one year**, and the number of days required has **reduced over time**, which is a **good sign**.

5.5. Is inventory sitting on shelves too long?

Inventory is another key check:

- If sales are rising, ideally:

- Inventory should **decrease** or stay **stable**,
- Not build up endlessly.

For NVIDIA:

- Inventory on shelves has **decreased over the years** while sales have grown, which is positive and suggests efficient inventory management.

5.6. Is the company spending money on investments (CapEx)? What does that say about competition?

I use **Estimated Capital Expenditure (CapEx)** as:

Estimated CapEx = Change in PP&E + Depreciation and Amortization

Findings:

- CapEx **jumped sharply from 2021**, which indicates:
 - A major **structural shift** in investment, or
 - Operation in a more **fiercely competitive market**, where staying relevant requires asset upgrades.
- From **2015 to 2025**, CapEx has clearly increased:
 - Average CapEx (2015–2019): **211.6**
 - Average CapEx (2020–2025): **1828.16**
- This means CapEx in the later period is roughly **8× higher** than in the earlier years.

5.7. CapEx has increased by ~8×. Has revenue increased by at least 8×?

Yes, it has.

- Average revenue (2015–2019): **1988.10**
- Average revenue (2020–2025): **44181.15**
- Revenue increased by roughly **22.22×**.

So, **revenue growth far outpaces CapEx growth**, which is very favorable.

5.8. Is the company buying new businesses at an advantage?

- For the initial few years, **goodwill** at NVIDIA was **fairly constant**, which suggests:
 - Either the company wasn't buying many businesses, or
 - Acquisitions were limited in size.
- Since **2021**, **goodwill has increased**, indicating:
 - The company is more actively **acquiring businesses**.
- Based on the pattern, it does **not** appear that these businesses are being bought **below book value**, as goodwill does not show sharp downward adjustments.

5.9. What is the situation for intangible assets like patents and copyrights?

- Intangible assets have **increased**, especially from **2021** onward. This likely means:
 - They are **filing more patents** and/or
 - **Buying companies** and thus acquiring their brands and IP.
- NVIDIA as a **brand** has significant value on its own, which is **not fully captured** in the financial statements, but is important to consider qualitatively.

5.10. If the company went bankrupt today, how much money would I get back?

This is a **hypothetical** scenario. Given NVIDIA's strong financials, the probability of bankruptcy seems low, but it's still a useful exercise.

I applied the following **recovery percentages** to total assets:

- Cash: **100%**
- Receivables: **60%**
- Inventory: **50%**

- Property (PP&E): **50%**
- Intangibles: **5%**
- Goodwill: **0%**

Then I:

- Calculated **Adjusted Total Assets**,
- Subtracted **Total Liabilities**,
- Divided by **outstanding common shares**.

Result:

- The adjusted value comes out to **0** → the retail investor **would get nothing** in this conservative scenario.

If I use **total assets as-is (no haircut)**:

- I, as a retail investor, would end up with about **\$3 per share**.

Conclusion:

In a bankruptcy, **retail investors are unlikely to recover much**, which is unfortunately typical for equity holders.

5.11. Does the company have less short-term debt compared to long-term?

- Short-term debt has **increased recently**, which:
 - Can be a **concern**, because
 - The company may be more exposed to **short-term credit market risk**.

5.12. How many years of profit would it take to pay off long-term debt?

To answer this:

- I **added up all long-term debt**
- Divided by **net income**

Findings:

- NVIDIA appears able to pay off long-term debt in **well under one year of profit**, which is a strong advantage.
- To be more conservative, I also divided debt by **free cash flow**:
 - This value is more volatile, but in the past **two years**, it suggests the company could pay off debt with the cash it currently generates in about **1.5 years**.

5.13. Is the company using debt or its earning power to finance operations?

- NVIDIA is primarily using **its earning power**, not debt, to finance operations.
- For every dollar of **shareholder equity**, the company carries only about **0.4 to 0.8** units of debt.
 - Anything below **0.8** suggests a **durable competitive advantage**.
- To calculate this, I used an **adjusted debt-to-equity ratio** (by including treasury stock).

This is a **good sign**.

5.14. Is the company making additions to retained earnings?

- The company has **consistently increased retained earnings**, except for **two years**.
 - This means **profits have generally grown**, and
 - NVIDIA has **reinvested** those profits back into the business.
- The **wealth created ratio** for **2025** is **0.99**, which is a **very good indicator**.

5.15. Treasury stock behavior

- Recently, NVIDIA does **not** show treasury stock,
- But it **did in the past**, which is generally seen as a **positive indicator** (especially if it reflects share buybacks at attractive prices).

5.16. Return on shareholder equity (ROE)

- Since **2020**, for every dollar of equity, NVIDIA has consistently generated **more than 20% profit**.
 - That is, about **0.2 “cents” per \$1** of equity (conceptually).
- In **2025**, the company generated about **0.9** in profit per **1.0 of equity**.
- The ROE graph is **not perfectly smooth**, but:
 - It is **never negative**, and
 - The levels are generally **strong**.

5.17. Does the company have any leverage that could “fake” competitive advantage?

- The company is **not using heavy leverage** to generate earnings.
- This suggests that high returns are more likely due to the **strength of the business**, not just financial engineering.

Final question on this theme:

Do you feel that the high ROE is driven by **financial engineering** or by an **exceptional business**?

Based on low leverage and strong profitability, my conclusion leans toward **exceptional business performance**.

5.18. Does the company have a consistent gross profit margin?

- Yes. NVIDIA has consistently maintained a **gross profit margin over 50%**.
 - This indicates **good underlying economics**.
- To fully gauge how special this is, we would need to:
 - Compare with **similar companies** in the same space.
- As a rule of thumb:
 - Companies with **gross margin below 40%** often operate in very competitive environments.

- NVIDIA's >50% suggests **durable competitive advantage**, but peer comparison would confirm this.

5.19. Is the company operating in a highly competitive space that forces high SG&A or R&D spending?

SG&A Expense

- SG&A has been **consistently below 30%**.
- This is a **good sign**, suggesting:
 - The company is **not forced** to overspend on advertising, salaries, travel, etc. just to stay relevant.

R&D Expense

- In this industry, **R&D is critical** for staying competitive.
- Initially, about **50% of gross profits** were consumed by R&D.
- Over time, this **percentage has decreased**, indicating that:
 - NVIDIA may have **found a way to remain competitive** without having to spend as large a share of gross profit on R&D.
- However, this requires **more research** to fully understand:
 - It could be related to **3–4 year product cycles**.
 - I observed spikes around **2015, 2020, 2023**.
 - These spikes may align with **major product launches or platform shifts**, which is worth exploring further.

Depreciation

- Depreciation is still a cost; generally, **lower is better**.
- NVIDIA has done an **excellent job keeping depreciation low** relative to its scale.

Financial Cost

- Financial (interest) cost is **very small**.
- The company has **very little to no meaningful debt payments** relative to operating income.

5.20. Does the company have high interest payments relative to operating income?

- No.
- Interest payments are **very low to almost none** compared to operating income.
- The company does **not appear to be in any danger** from interest obligations.

5.21. Is net income increasing?

- Year-over-year (YOY), net income is **somewhat volatile**.
- However, the **average net income growth** from **2014 to 2025** is about **60%**, which is very strong.

5.22. Does the company have a higher percentage of net earnings to total revenue?

- Over the years, this ratio has been **“all over the place.”**
- In the **last two years**, NVIDIA has managed to have about **40% of net earnings to total revenue**, which is very high.
- This can be seen as a small **yellow flag** only because:
 - The ratio is **not very consistent**.
- I don't see this as alarming, but:
 - It would be useful to analyze **peer companies** to see what typical net margin levels are.
- As a rule of thumb:
 - If **net earnings to revenue > 20%**, it is usually considered a **very good business**.
 - NVIDIA fits this, even if it is not stable year to year.

6. Summary Checklist

A quick visual summary of the key questions and conclusions:

Financial Health Checklist – the acceptable values are

- **Great**
- **Good**
- **Okay**
- **Bad**
- **Risky**

#	Question	Rating
1	Enough cash to meet short-term obligations?	✓ Great
2	Cash levels show a sustained pattern (not just one-time hoarding)?	✓ Great
3	Does total debt hurt cash flow, or does cash still exceed debt?	✓ Great
4	Are Accounts Receivable proportional to sales growth, with healthy DSO?	✓ Great
5	Is inventory moving (not sitting idle)?	✓ Great
6	Is rising CapEx a sign of competitive investment?	✓ Good
7	Has revenue grown more than CapEx (22× vs 8×)?	✓ Great
8	Are acquisitions (goodwill) likely at attractive prices?	⚠ Good / Not Clearly Cheap
9	Are intangible assets and IP strengthening?	✓ Great
10	In bankruptcy, would shareholders recover much?	⚠ Okay but chances low (Very Low Recovery)

#	Question	Rating
11	Is short-term debt comfortably lower than long-term debt?	⚠️ Okay but not risky (Short-Term Debt Has Increased)
12	Can long-term debt be paid off in a short period of profits?	✅ Great
13	Is the company funding operations mainly through earnings, not debt?	✅ Great
14	Are retained earnings consistently growing?	✅ Great
15	Is treasury stock behavior historically shareholder-friendly?	✅ Good
16	Is ROE consistently strong (>20%)?	✅ Great
17	Is high ROE driven by real business performance, not leverage?	✅ Great
18	Is capital expenditure burn reasonable (≈30%, <50%)?	✅ Great
19	Is cash mainly generated from ongoing operations vs one-time events?	✅ Good–Great (directionally positive)
20	Are earnings and operating cash flow rising together?	✅ Good (needs deeper linkage but signals are positive)