

Samsung is navigating a cyclical downturn in the global memory market, which is impacting its core business; however, its dominance in conventional memory chips, strong consumer electronics franchises, and robust balance sheet position it well for a powerful recovery and long-term, sustainable earnings growth.

Korea's Samsung Electronics is perhaps best known for its high-end OLEDTVs, audio equipment, popular Galaxy smartphones, and wide array of home appliances. A part of the business that consumers don't see—memory chips—drives the bulk of the conglomerate's earnings, but it is also what has been weighing on the stock's valuation. A memory downcycle has impacted Samsung's profitability, while investors worry its competitors have an insurmountable lead in a specific type of high-end memory required for AI applications.

We expect the characteristically cyclical memory market to ultimately normalize, as supply and demand come back into balance, while Samsung should maintain its dominance in conventional chips. With shares trading at a low double-digit earnings multiple despite 15% projected annual earnings growth¹, we believe investors are underappreciating Samsung's scale and financial strength, moderating growth capex², and dominant smartphone, display, and consumer electronic franchises, while overreacting to its technological gap with peers on next-generation memory chips.

SAMSUNG: A SPRAWLING GLOBAL ELECTRONICS CONGLOMERATE

While memory is the main driver of Samsung's expected earnings improvement, roughly a third of the company's estimated normal earnings power—representing approximately \$147bn in FY24 sales—is derived from its other segments (Exhibit 1). Its 58,000-employee, \$20bn revenue subsidiary, Samsung Display, designs and manufactures OLED display panels for devices such as smartphones, laptops, and TVs. This business has a leading 50% global market share³, and makes up ~10% of Samsung's companywide revenue.

1. FactSet; Est. EBIT CAGR FY24-FY27
2. Capital expenditures
3. TechInsights

	Price	Earnings Per Share			Price/Earnings		
		FY 25E	FY 26E	Normal*	FY 25E	FY 26E	Normal**
Samsung Electronics	KRW 57,800	KRW 4,697	KRW 6,003	KRW 8,200	12.3x	9.6x	8.2x

Fiscal year-end March 31.

*Pzena estimate of normal earnings.

**Globally adjusted price-to-normal multiple based on Korean discount rate.

Source: FactSet, Pzena analysis. Data as of March 31, 2025

Samsung's semiconductor foundry business, though relatively subscale, is still the second largest chip manufacturer in the world behind TSMC⁴, generating \$18bn in annual sales. This business has been in the red for the past two years, though losses are expected to narrow by way of yields improving or capacity reductions, and we are only assuming breakeven profitability in our model.

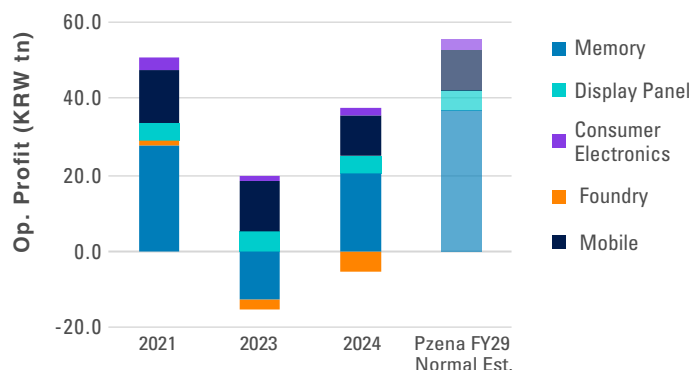
Samsung's mobile unit is a global juggernaut, responsible for 223 million smartphone sales last year (behind only Apple)⁵, translating to \$7bn in operating profit. This segment, which we estimate makes up about 20% of normal operating income, has acted as an earnings ballast for the company, with stable volumes, low-double-digit margins that are rangebound, and steadily rising ASP⁶ driven by high-end popular models like its foldable Galaxy Z phone.

Through its massive consumer electronics arm, Samsung sold 31 million PCs last year (fifth most sold globally)⁷, is a leading manufacturer of refrigerators, microwaves, washing machines, and other appliances, and is the largest TV-maker in the world—a position it has held for 19 consecutive years⁸.

4. Bloomberg Intelligence
5. Bloomberg Intelligence
6. Average selling price
7. Bloomberg Intelligence
8. Samsung, Omdia

HIGHLIGHTED HOLDING CONT.

EXHIBIT 1: SAMSUNG'S SEGMENT EARNINGS



Source: Company filings, Pzena analysis

MEMORY: AN ESSENTIAL COMPONENT OF MODERN COMPUTING

Dynamic random access memory, or DRAM, is a type of memory that provides a CPU or GPU with fast access to temporary data storage for programs to run efficiently. It is a crucial component in increasingly powerful electronic devices, such as smartphones, PCs, tablets, and servers. Since 2007, DRAM demand has grown at a nearly 26% CAGR⁹, with industrywide revenue reaching \$100bn in 2024¹⁰. DRAM typically makes up less than 10% of a system's total cost, but it is essential for modern CPUs to function, meaning volumes should continue to grow with computing power.

The industry is structured as an attractive oligopoly, with Samsung's leading 39% market share followed by Korean peer SK Hynix and US-based Micron. These three companies collectively supply nearly 94% of the market¹¹. Samsung's historical dominance in conventional DRAM is a result of its scale and superior technology, affording it a discernable unit cost advantage over Hynix and Micron.

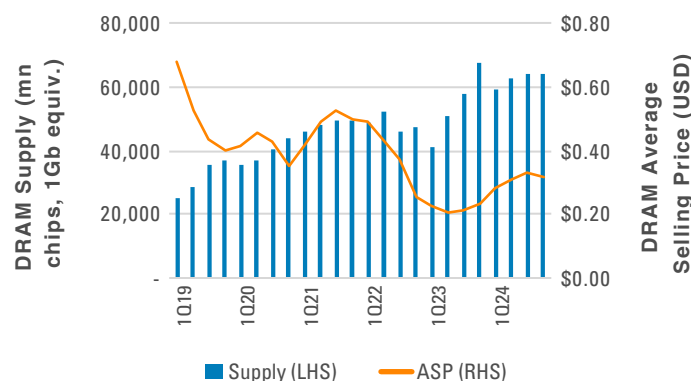
High-bandwidth memory (HBM) is a type of non-conventional DRAM enabling extremely high-bandwidth data transfer needed for artificial intelligence and other emerging technologies. While not a major part of the memory stack today, HBM is expected to become an increasingly larger piece of the profit pool over time, making it an important growth driver.

While it is a much smaller portion of their overall memory business, Samsung also maintains a leading ~29% market share¹² position in NAND flash, a type of storage technology used in portable memory devices such as thumb drives and SD cards. The NAND industry is roughly half the size of DRAM, but it is similarly concentrated, with the largest 6 players controlling 90% of the supply¹³.

A TURN IN THE MEMORY CYCLE

The surge in consumer spending during the early months of the COVID-19 pandemic was particularly acute for consumer electronics, with unit sales of notebooks and tablets up 44% and 81% respectively in the fourth quarter of 2020¹⁴. Memory suppliers, assuming sustained peak demand, boosted capacity throughout 2021/22 just before end demand started to normalize; as a result, conventional DRAM prices collapsed, sinking industrywide profitability in 2023, and the market is still digesting the oversupply today. NAND, similarly affected by oversupply, also entered a downcycle, with prices falling nearly 50% year-over-year in 2023, exacerbating the profit decline in Samsung's core memory unit.

Exhibit 2: Conventional DRAM Prices React to Oversupply



Source: Mizuho; ASP and supply of conventional DRAM (excludes HBM)

Samsung shelled out billions of dollars to boost production of conventional, more lagging-edge memory chips whose demand was waning due to inventory destocking. For context, Samsung's DRAM capex between 2021 and 2023 accounted for 51% of total industry investment¹⁵, while its DRAM sales only represented 43% of global industry revenue¹⁶. Its cash return on DRAM, which incorporates both operating

12. Morgan Stanley

13. Morgan Stanley

14. Morgan Stanley

15. Mizuho

16. Mizuho, company filings, Pzena analysis

9. Compound annual growth rate; UBS Total DRAM Demand (M 1Gb) 2007-24

10. UBS

11. Bernstein 2024 shipment estimates

HIGHLIGHTED HOLDING CONT.

costs and capex, plummeted to 3% in 2023 after averaging over 30% pre-COVID¹⁷. With the stock down roughly 50% from its early 2021 high, we significantly increased our stake in late 2024.

DRAM MIX SHIFT AND THE HBM CONTROVERSY

Samsung's management is focusing on what they can control to improve profitability in their core memory business. The company is pulling back capex on wafer expansion and redirecting spending towards node migration and HBM capacity. This should result in a memory mix that's less exposed to lagging-edge nodes in oversupply, and more in line with Hynix and Micron's leading-edge skew.

Investors have unsurprisingly been fixated on HBM, given its long-term growth potential and importance in powering the AI revolution. To that end, Samsung has thus far lagged both Hynix and Micron in qualifying for high-end HBM used in AI GPUs—specifically NVIDIA's—eliciting some concern from investors. Based on our research, we believe that Samsung's lack of qualification is more a result of being caught off guard by how quickly AI demand has exploded versus it having an insurmountable technology gap with peers on HBM chips. We therefore believe Samsung will ultimately participate in the anticipated demand wave, potentially capturing market share nearly proportional to its conventional DRAM share.

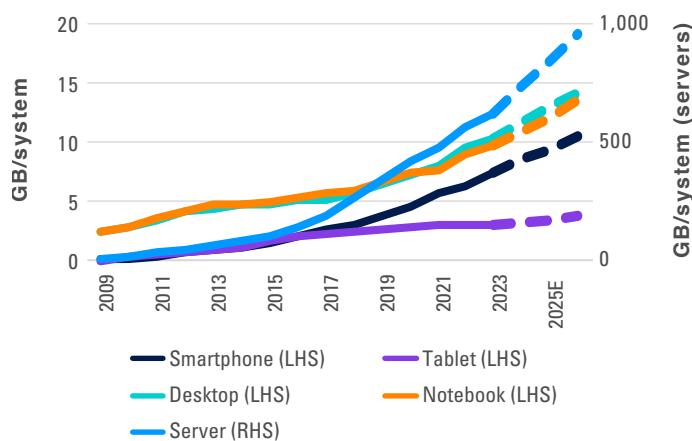
FORTRESS BALANCE SHEET SUPPORTS HIGHER CAPITAL RETURNS

It's also worth noting that Samsung has \$63bn in net cash on its balance sheet, whereas its two competitors—Hynix and Micron—are both levered. The tech giant clearly has the financial wherewithal to return capital to shareholders, and management has been doing just that. Since 2018, when Samsung enhanced its capital return policy, the company has paid out nearly \$67bn in cumulative dividends to shareholders, which equates to 34% of aggregate net income¹⁸. Encouragingly, for the first time since 2017, Samsung started buying back its stock, and we expect the company to continue returning more of its war chest to shareholders going forward.

CONCLUSION

It's easy to envision a more electrified, connected, and technologically advanced world in the near future. DRAM—particularly leading-edge nodes and, increasingly, HBM—will undeniably play a critical role in enabling such an environment. Memory content per device has steadily risen over the past two decades, with server DRAM exhibiting exponential growth (driven, in part, by AI servers), as computing power continues to expand.

Exhibit 3: DRAM Content per System Should Continue to Grow



Source: Bernstein

After a period of somewhat short-sighted overinvestment, Samsung is, in our view, well-positioned to capitalize on an anticipated memory upcycle. Regarding the U.S. tariff risk, smartphones, PCs, and other electronics - including memory chips themselves - are currently exempt from reciprocal levies, so the direct impact on Samsung is minimal. Regardless, we are closely monitoring the situation, and our model reflects a wider range of outcomes reflecting U.S. trade policy uncertainty.

Even in the unlikely scenario that Samsung proves to be structurally behind its peers at the leading edge in HBM, and the company's historical competitive dynamic in conventional DRAM deteriorates, resulting in commodity-like returns in perpetuity—none of which we've seen any evidence of—we believe the stock is fairly valued today, implying the HBM downside scenario is largely priced in.

In a concentrated, three-player market, we believe the gains from DRAM growth should largely accrue to Samsung in the years ahead, which the market, by ascribing a 8.2x multiple on our estimate of normal earnings, isn't appreciating, in our view.

17. Company filings, Pzena analysis

18. Company filings, Pzena analysis

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