

Executive Summary

Apollo hospitals is an Indian multinational healthcare group headquartered in Chennai. Along with the eponymous hospital chain, it also operates pharmacies, primary care and diagnostic centers and telehealth clinics through its subsidiaries. It was the first corporate healthcare company in India founded in 1983 by Dr. Prathap Reddy and became the first hospital to get included in the NIFTY Benchmark index

- 1 Apollo Health Co:** Apollo Health Co was formed in 2021 with the merger of the group's non-hospital pharmacy chain Apollo Pharmacy and its digital healthcare business known as Apollo 24/7
- 2 Apollo Health and Lifestyle:** Apollo health and lifestyle is the primary care arm of the group which operates multi-specialty clinics under Apollo Clinics, diagnostics and pathology labs under Apollo Diagnostics, diabetes under Apollo Sugar, dental hospitals under Apollo White, dialysis centers under Apollo Dialysis, surgical hospitals under Apollo Spectra, women/children under Apollo Cradle, and fertility clinics under Apollo Fertility
- 3 Apollo Telehealth Services :** Apollo telehealth services owns the telehealth network of the group, operating via a B2C model under which it offers direct services like online consultations, appointment booking, medicine delivery, a B2B offering to corporates for their employees and a B2G agreement providing telehealth services in partnership with public health systems
- 4 Research and education services :** Apollo research and innovation is a research arm of the group which is involved in clinical trials of drugs, medical devices, healthcare software and consumer products. Apollo Medskills is a private-public partnership between Apollo Hospitals and National Skill Development Corporation started in 2012 for the development of medical skills of healthcare workers through 40+ training institutes across the country

Corporate Governance

Senior management and board of directors primarily comprising of the founder family

Particulars (Senior Management)	Dr. Prathap C. Reddy	Ms. Suneeta Reddy	Dr. Sangita Reddy	Dr. Preetha Reddy	Ms. Shobana Kamineni
Executive title	Founder, Chairman	Managing Director	Joint Manging Director	Executive Vice Chairman	Executive Vice Chairman
Age / Yrs with the firm	89 / 39	63 / 33	59 / 33	65 / 33	61 / 34
Board Memberships	5	5	9	9	5
Salary (FY22) (INR mn)	75.4	38.3	38.3	38.3	38.3
Total Compensation (including variable pay and commission)	167.0	59.7	59.4	59.7	60.0
Variable Pay as a %age of total compensation ⁽¹⁾	25%	36%	36%	36%	36%
Member of the board?	Yes	Yes	Yes	Yes	Yes
Member / Related to the founding family?	Yes / Yes	Yes / Yes	Yes / Yes	Yes / Yes	Yes / Yes

Particulars (Board of Directors)	Details
Number of Members	11
Number of founder family members	5
Chair of the Board	Dr. Prathap C. Reddy
%age of Insiders ⁽²⁾	45%
Number of board members with other board memberships	10
Avg. Age of Board Members	>60
ISS Corporate Governance Score ⁽³⁾	5

- The firm is run by the founder's family (4 daughters) each of whom is leading one business vertical and are also part of the Board of Directors. However, the final say is with the Founder and Chairman Dr. Prathap Reddy
- Board of Directors is independent according to the regulatory requirements of having more than 50% of the board as independent directors. However, most of the 6 independent members have had direct business connections with the insiders of the company over many years
- Even though the promoter group has ~30% shareholding, the overall say the promoter group has in the overall day-to-day business operations is significant, highlighting that the board does not generally have a high check on the management
- The various board meeting attendance has been very high (>80%) by all the board members, however, only 1 of the 6 independent directors has a background in healthcare / medicine, further explaining the low corporate governance score and a not so effective board

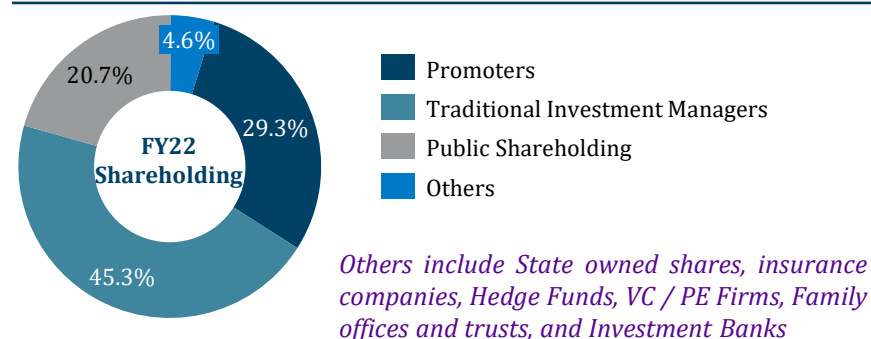
Note: (1) No executive director is paid stock compensation. Since all the founding family members are executive directors, the stock-based compensation is zero for all; (2) Insiders also include the relatives of founders family; (3) 1 is least risky, 10 is most risky

Financial and Market Relationship

Market Profiles⁽¹⁾

Particulars	Details
Credit Rating	AA+ (S&P)
Interest Coverage Ratio	4.4x
Analyst Coverage	31
No. of buys / holds / sells	31 / 0 / 0
Market Cap (INR m)	688,448
Avg. 3M Daily Trading Volume(mn) / Float %	0.58 / 70.1%

Stockholder Analysis⁽²⁾



- Apollo hospitals has stated both stakeholder wealth maximization and share price maximization as the key business objectives. However, it is not clear which is the focus as they both align with different scenarios
- The corporate charter does not have any anti-takeover clauses, proxy voting rules are more inclined towards the incumbent management and the voting structure is one vote per common share for all shareholders with no dual class share structure
- There is one activist investor involved that voted against a certain Charmain remuneration policy, however, most of the institution investors including the largest external shareholder (Schroder Investment Management)⁽³⁾ voted in favor of the management
- This further confirms that even though the promoter group has ~30% of the shareholding, it still has significant influence and that the external shareholders are more attuned to sell stake in case they are not comfortable with the corporate governance policies rather than fight in annual meeting
- The analyst coverage also shows that the market is not keen on asking the tough questions and is in overall alignment with the incumbent management overall message as there is a 100% buy recommendation from the entire coverage universe

Risk and Return Analysis

Top-Down Analysis

Particulars	Details
Raw Beta (Slope)	0.87
Intercept	2.12%
R-Squared	16.4%
Annual Risk Free Rate (5 Yr Avg)	6.46%
Jensen's Alpha (Annualized)	27.55%
Standard Error of Beta	0.25
Beta 67% range / 95% range	0.62-1.13 / 0.36-1.38
Reference Index	Sensex BSE

Bottom-Up Analysis

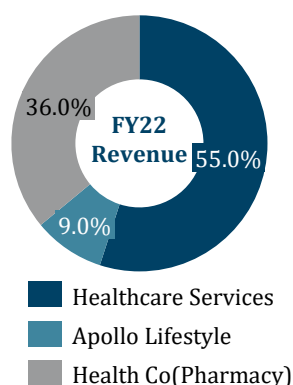
Particulars	Details
Unlevered Beta (Based on Industry)	0.3
Share Price ⁽¹⁾	INR 4,788.05
Diluted shares outstanding (in millions)	143.8
Market Cap (in INR millions) ⁽¹⁾	688,448
Market Value of Net Debt	36,049
Net Debt / Equity	5.2%
Levered Beta	0.31
Sample Size	299

- Apollo hospitals has a high Jensen's Alpha of 27.55% - outperforming the market over the last 5 year period
- This outperformance has been driven more over the last 2.5 years with the market rally post - Covid and that healthcare facilities were significantly in demand due to the human impact of COVID
- The regression also shows that 16.4% of its risk is market-related, whilst the remaining is company specific, which can be diversified away by the marginal investor
- While the regression analysis provides one view of risk, it is crucial to note that the estimates are not always precise, and the precision of this beta estimation is assessed by the standard error which creates a wide range of beta
- Apollo hospitals has multiple business segments - hospitals, healthtech, e-Pharmacy, however, all the revenues are consolidated under one head of hospitals and that on a standalone basis the hospitals segment has the largest revenue mix
- The company has a very low net debt / equity ratio, reflecting the fact that Indian organizations generally don't prefer a lot of debt unless the business model has an element of inorganic growth
- The unlevered betas of hospitals and healthcare facilities is generally low stating that those business models are not discretionary spends, generally have high capex spends for hospital expansion and medical equipment, but because they are able to generate free cash flows very early, the market rewards them with low betas

Return vs Cost Analysis (Segment-wise Benchmarking)

Cost of Equity			Cost of Debt			Cost of Capital	
Cost of Equity 10.67% (w=95.02%)			Cost of Debt⁽¹⁾ 6.42% (w=4.98%)			Cost of Capital 10.45%	
Risk Free Rate 5.38%	Levered Beta 0.31	ERP & CRP 4.6% & 3.1%	Risk Free Rate 5.38%	Rating Spread 1.3%	Country Spread 3.1%	MV Equity INR 688.44bn	MV Net Debt INR 36.04bn
<i>India 10Y : 7.25% Default Spread: 1.87%</i>			<i>India 10Y : 7.25% Default Spread: 1.87%</i>			<i>MV Equity is share price * diluted shares⁽²⁾</i>	
<i>Bottom-Up Beta</i>			<i>Rating Spread is added because the rating is done by CRISIL</i>			<i>MV Net Debt is the market value of bonds and lease commitments</i>	
<i>CRP based on the default spread of India with lambda of 1.25 since 100% of revenue is from India vs 80% for the average Indian company</i>			<i>CRP based on the default spread of India</i>				

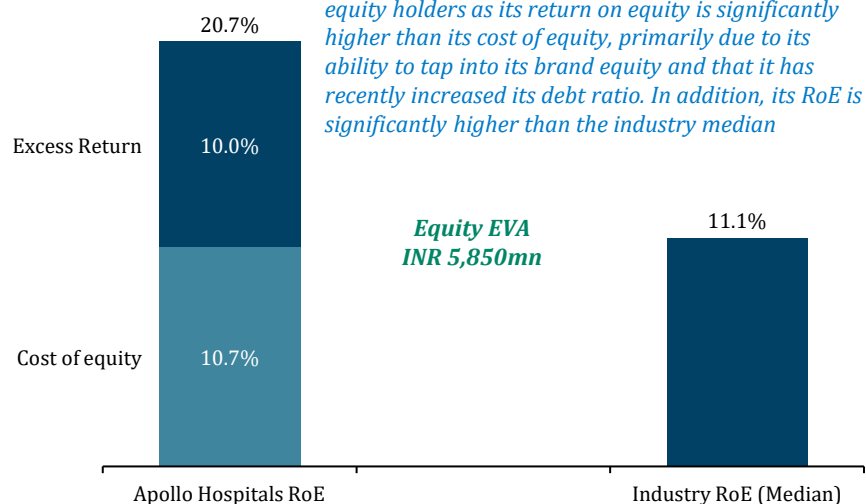
Segment-Wise Hurdle Rates⁽³⁾



Business Segments	Sample Size	Unlevered Beta	Net Debt / Equity	Levered Beta	After-Tax Cost of Debt	Cost of Equity	Cost of Capital
Healthcare Services	89	0.20	10.7%	0.21	6.42%	10.2%	9.8%
Apollo Lifestyle	85	0.33	10.9%	0.35	6.42%	10.9%	10.4%
Health Co (Pharmacy)	125	0.51	2.7%	0.51	6.42%	11.6%	11.5%

Equity Return Benchmarking

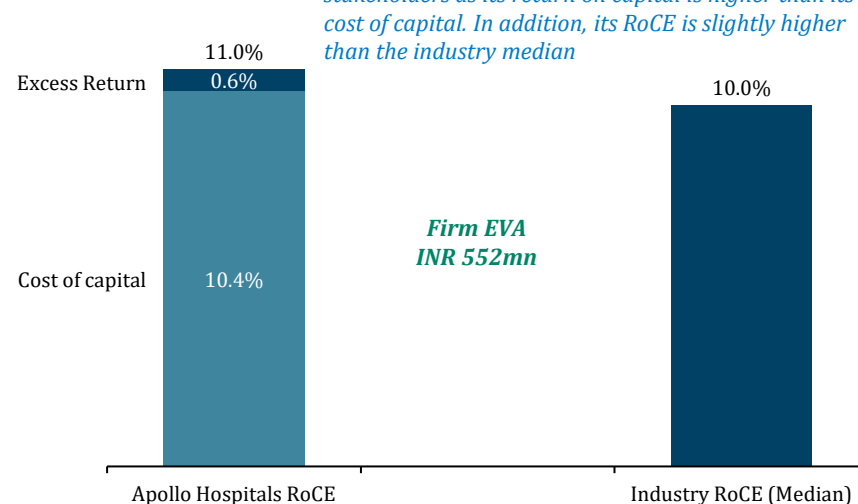
Return on Equity %



Apollo Hospitals is adding significant value for its equity holders as its return on equity is significantly higher than its cost of equity, primarily due to its ability to tap into its brand equity and that it has recently increased its debt ratio. In addition, its RoE is significantly higher than the industry median

Capital Return Benchmarking

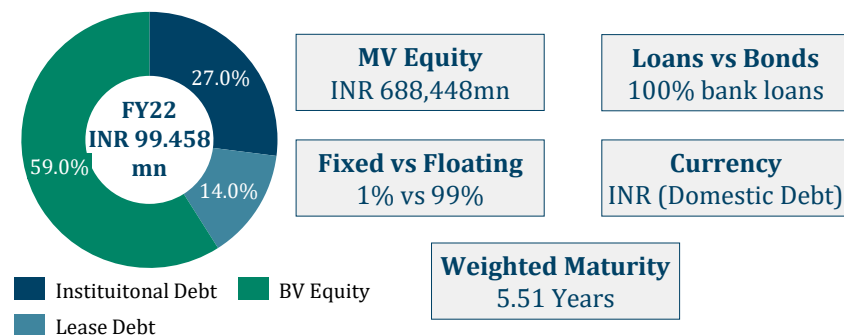
Return on Capital %



Apollo Hospitals is adding some value for all its stakeholders as its return on capital is higher than its cost of capital. In addition, its RoCE is slightly higher than the industry median

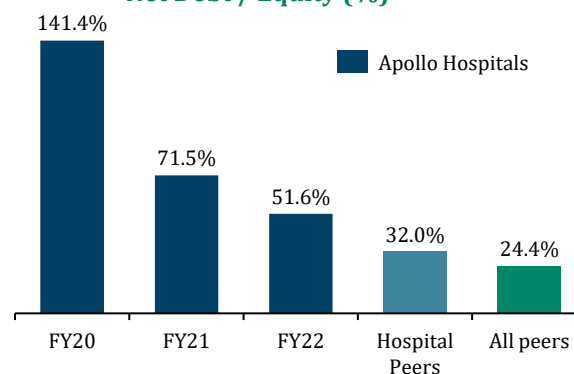
Capital Structure Choices

Existing Capital Structure



Apollo Hospitals has an average maturity of 5.51 Years, which almost aligns with the fact that on average in India, a new 100+ bed hospital takes ~7 years to breakeven in terms of operating earnings

Net Debt / Equity (%)⁽¹⁾



Apollo Hospitals net debt/equity is relatively high w.r.t hospital peers and all peers considered. However, it has continuously reduced its debt obligations over the last three years and has improved its interest coverage ratio from 1.9x in FY20 to 4.4x in FY22

Added Discipline of Debt

- Promoter family owns a significant shareholding and most of their wealth is tied in the company. A significant shareholding is also with institutional investors that can exert enough influence if required
- As the debt ratio is relatively high, there is a high discipline of debt on the management of the company to ensure that sustainable cash flows are generated to ensure that stock price is not impacted by high leverage

Agency Costs

- Agency costs for Apollo Hospitals seem to be low as the promoter family is deeply involved in the day-to-day running operations and hold significant minority shareholding
- Tangible assets as a %age of total assets are ~60% allowing the company to use these assets as collateral. Furthermore, high predictability of cash flows and the history of payment of due debt allows comfort to the lenders

Bankruptcy Risks and Costs

- Risk of bankruptcy for Apollo hospitals is low as the interest coverage ratio is ~4x, that has improved significantly over the last two years
- Furthermore, focus on healthcare has increased significantly post COVID, allowing Apollo Hospitals to foray into new focus areas using health-tech and tapping into the huge potential of preventive medicine and thus improving sustainable cashflows of the company

Future Flexibility

- Apollo hospitals future flexibility is reasonably high as it can use equity to acquire new age business models or reinvest cash flows to build new divisions with a long – term focus without impacting equity value
- Considering the high debt ratio of the company, it puts some constraints on its ability to raise more capital for faster deployment. However, since it is a mature company with low cyclicality, high debt ratio does not dampen the potential growth opportunities of the company

Marginal Tax Rate
30%

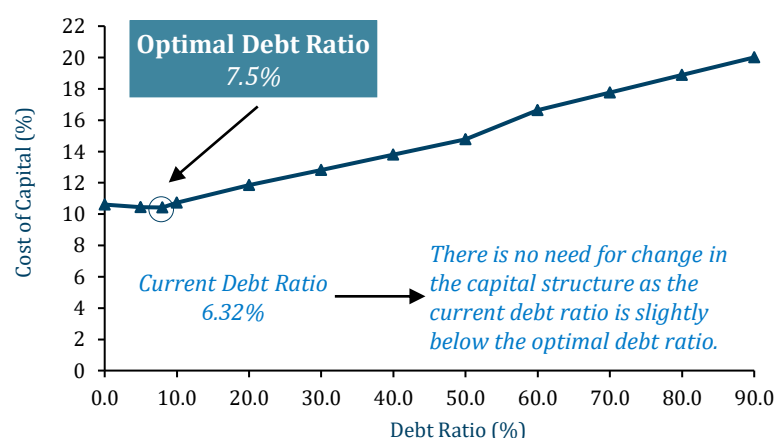
Effective Tax Rate
30%

Tax Benefit from Borrowing
Yes

Tax Benefit from Borrowing
INR 7,907m

Optimal Capital Structure⁽²⁾

Cost of Capital Approach

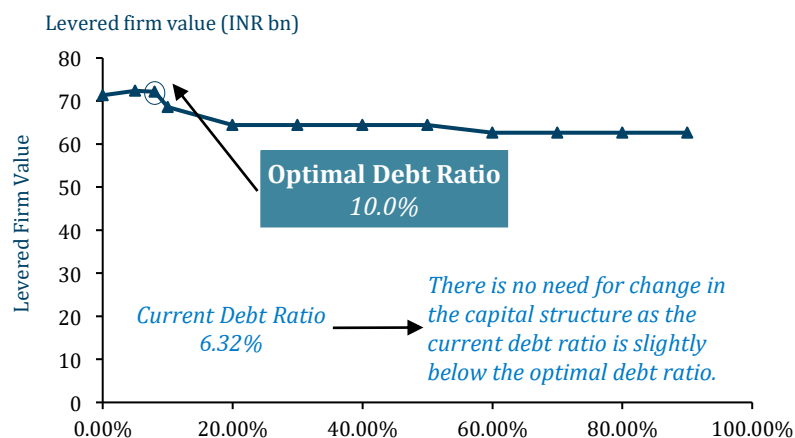


Particulars	Details
Threat of Takeover	Low – High Jensen's Alpha and the promoter group has significant sway
Threat of Bankruptcy	Low – Even though the debt ratio is high relative to peers, the interest coverage ratio is strong to cater to the interest payments
Future Project Strength	Medium – Apollo hospitals generally follows a 'build' strategy for new hospitals or divisions. Even if the company takes debt for a new project, the history of debt payments is enough to provide comfort to the lenders
Change in Firm Value by moving to optimal (INR / %)	INR 3,871mn / 0.53%

Note: (1) Based on book values; (2) Debt Ratio as based on Gross debt and on market values of debt and equity

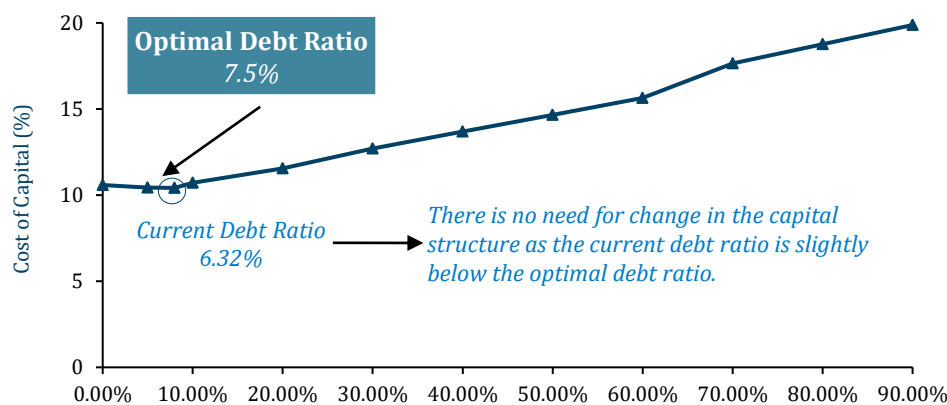
Alternative Approaches to Optimal Cost of Capital

Adjusted Present Value Approach (APV)⁽¹⁾



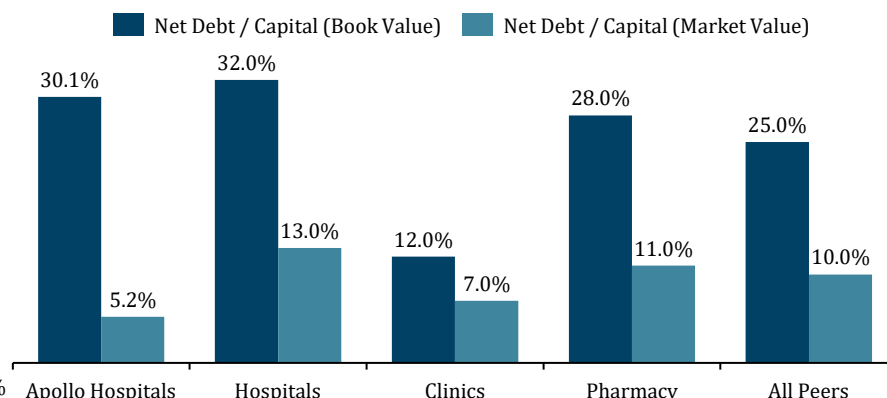
Particulars	Details
Expected Tax Benefit at Optimal Debt Ratio	INR 22,046 mn
Bankruptcy Cost as a %age of firm value	1.52%
Threat of Bankruptcy	Low- Low bankruptcy costs as a %age of firm value with high interest coverage ratio
Threat of hostile acquisition	Low - Promoter family has significant stake and sway in the day-to-day operations, regulatory structure not conducive for hostile acquisition at reasonable prices
Change in the debt ratio (Current-> Optimal)	Not required as the difference is not material

Enhanced Cost of Capital Approach⁽¹⁾



Relative Analysis⁽²⁾

Net Debt / Capital Ratio (Median)



In India, the impact of credit rating drop in hospitals is not significant as Indian patients are more of 'doctor followers' rather than 'hospital brand'

In market value terms, Apollo Hospitals seems to be under-levered, however, in book value terms it seems slightly over-levered due to recent issuance of debentures in FY21

Regression Analysis

Regression Statistics	Particulars	Coefficients	Standard Error
R square	80.7%	Intercept	0.101
Standard Error	0.79	Effective Tax Rate (%)	0.011
Observation	299	EBITDA / EV	0.266
		Capex / EV	-0.053

$$\text{Predicted net debt ratio} = 0.101 + 0.011 * (\text{Effective Tax Rate \%}) + 0.266 * (\text{EBITDA/EV}) - 0.053 * (\text{Capex/EV}) = 11.20\%$$

Summary

Particulars	Optimal Debt Ratio
Actual Net Debt Ratio	5.2% (Market Value)
Standard Cost of Capital Approach	7.5%
Enhanced Cost of Capital Approach	7.5%
Adjusted Present Value	10.0%
Relative Analysis (All peers)	10.0%
Regression	11.2%

Feature of ideal debt for Apollo Hospitals should be:

- Long Term- Most of the investments involve building new business divisions, medical devices or new hospitals that take long time to generate sustainable cash flows
- in INR - All of the operations are based in India
- Fixed Rate - Apollo hospitals has a well-renowned brand equity, however, in India patients generally seek doctors more than hospitals and if the doctor changes hospitals, the patients move to the new hospital or centre. Thus, Apollo Hospitals even though has pricing power, cannot transfer the prices that significantly to the patients due to the dependency more on the doctor reputation than on its quality of services
- Straight Debt - Since Apollo hospitals is mature company, and is not expected to have exponential high growth in cash flows at a consolidated level. If the new age digital tech division were to be siphoned off as a separate entity and seeks to borrow, that specific division ideally should issue convertible debt

Note: (1) Debt Ratio as based on Gross debt and on market values of debt and equity; (2) Book Value of Capital is FY22

Framework for Dividend Policy

Historical Dividend Policy

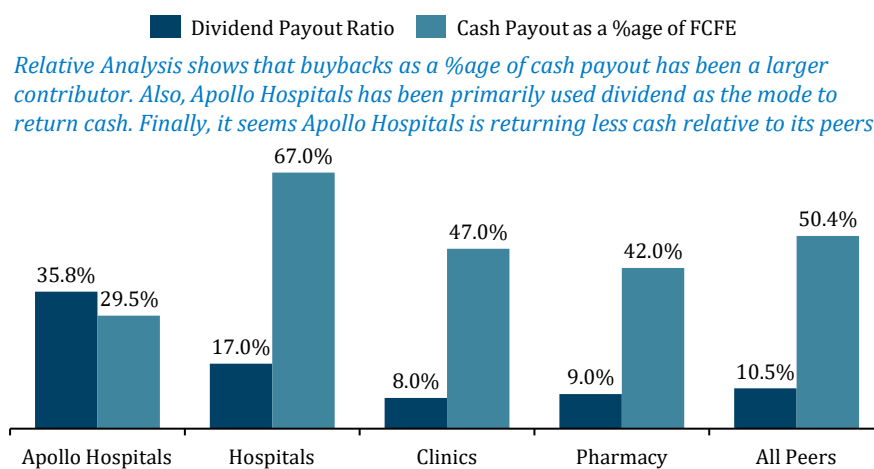
In INRm

Particulars	FY18	FY19	FY20	FY21	FY22	Aggregate
Dividends + Buybacks	1,008	837	1,287	383	433	3,948
Dividend Payout Ratio	85.9%	35.5%	28.3%	25.5%	4.1%	
Dividend Yield ⁽¹⁾	0.43%	0.53%	0.42%	0.15%	0.27%	
FCFE	102	612	3,618	4,999	4,076	13,407
Cash Paid as a %age of FCFE	983.9%	136.8%	35.6%	7.7%	10.6%	29.5%

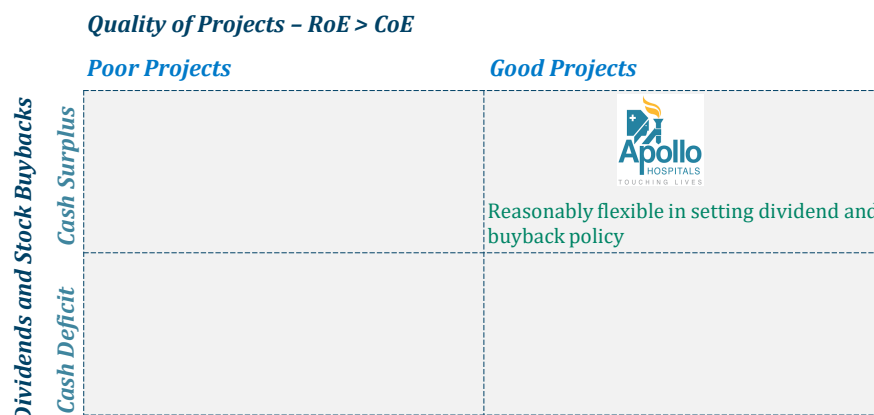
Key Observations:

- FY21 dividends were decreased as Apollo Hospitals had restated the lease expenses as debt and thus as debt covenants were coming under strain, the company reduced the dividend payout ratios to align with the borrower contractual obligations
- Significant increase in operational revenue and operating income resulted in a high growth in operating income, which coupled with lower capex needs and a higher depreciation and amortization expenses due resulted in a much higher FCFE in FY20 – a trend that has continued in latter years
- Dividends in India are taxed based on the investors' tax slab of the total income. Generally most of the investors are above the 15% tax rate slab, thus it does not make sense for the company to improve its dividend yield significantly as the capital gains tax rate are 15% for the short-term gains (assuming dividends are short-term, i.e. less than 1 year) and 10% for the long-term capital gains.
- The company is also expanding itself into the new-age digital and secondary and tertiary healthcare segments, further highlighting the aspect of more capital for reinvestment and thus low need to improve its payout ratio

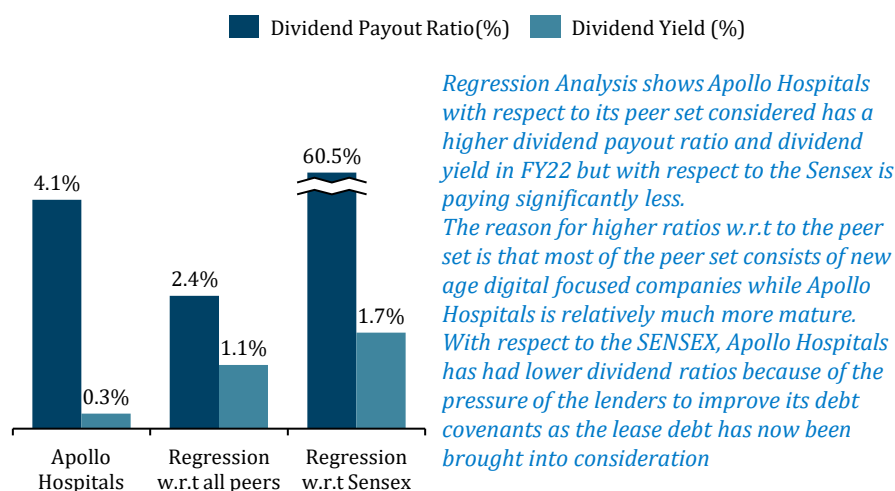
Relative Analysis⁽²⁾



Framework for Analyzing Dividend Policy



Regression Analysis⁽³⁾



Summary

- Shareholders have been historically been receiving dividends, with no buybacks done by the company
- The company has provided return opportunity both for dividend preferring shareholders and growth seeking shareholders
- The company has also managed its dividend payout ratio depending on its capex needs, changing business models and the macro-economic situation
- Since the current focus of the company is to evolve into a one-stop platform for primary, secondary and tertiary healthcare, the company seems to be on a path of reinvesting more into new age business models and thus reduce its dividend ratios

Valuation

Discounted Cash Flow Valuation⁽¹⁾

In INRm

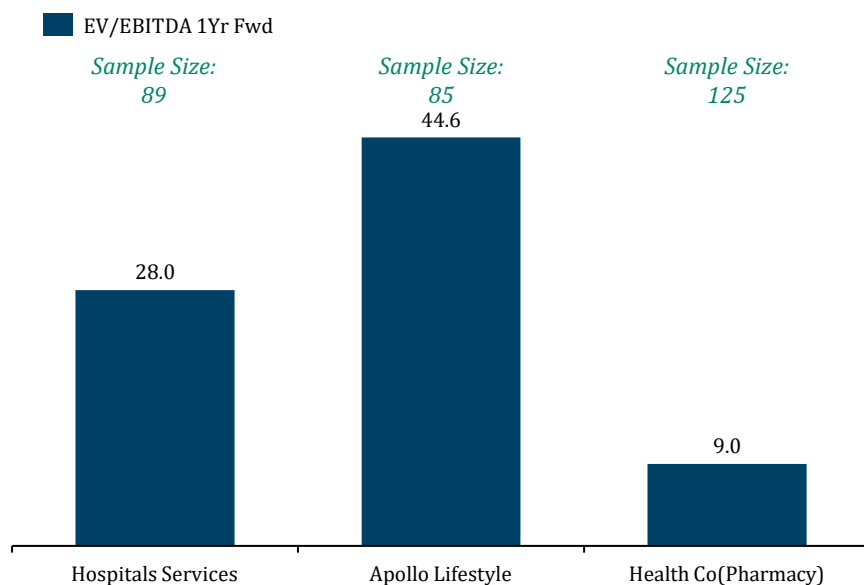
Particulars	Values
Pattern	2-stage
High Growth Period	5 years
Enterprise Value	856,742
Net Debt	36,049
Minority Interest	2,544
Equity Value	818,149
No. of shares outstanding (mn)	143.8
Implied Share Price	5,690.1
Recommendation	BUY
Upside / (Downside)	18.8%

Narrative

- Covid-19 has significantly pushed the focus on healthcare with significant demand for preventive care and self-awareness
- Apollo is undergoing a optical transformation journey towards creating an omni-channel healthcare platform that could help cross-sell multiple healthcare services under one roof
- Business normalization in healthcare is expected to improve due to the lifting of travel restrictions, increase of elective surgeries and medical tourism
- The new hospitals, ventures are turning profitable on the back of a judicious case mix besides better occupancy, reducing ALOS and increasing ARPOB /day
- The company generally has a 'invest and build model' helping it control cash outflow and inter-mingle the new services with the existing mix gradually without spending much on new investments

Relative Valuation

In INRm



Particulars	Values
Enterprise Value – Healthcare Services	611,238
Enterprise Value – Apollo Lifestyle	93,320
Enterprise Value – Health Co	92,570
Total Enterprise Value	797,127
Net Debt	36,049
Minority Interest	2,544
Equity Value	758,533
No. of shares outstanding (mn)	143.8
Implied Share Price	5,275.5
Recommendation	BUY
Upside / (Downside)	10.2%

Recommendation

- Both the intrinsic valuation and the relative valuation suggest that Apollo Hospitals is undervalued. Based on this analysis, it is recommended that investors **BUY** based on the current market capitalization
- Most of the companies have growth seen a drop in their market capitalization due to various macro-economic factors. Even though the Indian markets have recuperated from the drop in the prices, the markets still have not built-in confidence for overall growth across the economy and thus the share prices reflect the choppiness
- Apollo hospitals has invested in the new-age business models and as medical tourism, elective surgeries increase and the impact of COVID subsidies, the new age business divisions will drive future growth with positive operating income, while the hospitals would continue to provide necessary cash impetus for reinvestment.

Note: (1) ALOS: Average length of stay, ARPOB: Average revenue per operating bed