HEALTHCARE COMPANY VALUATION (CASE STUDY OF HOSPITAL ABC)

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Abstract

The acquisition company of Ministry Stated-Owned Enterprise (SOE) are a very important issue in Indonesia. Similar to other SOE holdings, the hospital will be grouped and managed by PT Pertamedika IHC, and the acquisition will benefit Hospital ABC, IHC, and all company stakeholders. This study assessing Hospital ABC's current business environment, determine forecast financial performance and determine Hospital ABC's Equity valuation. This study analyses the environmental aspects of Hospital ABC, both external and internal, as well as the healthcare sector. Research methodology using both qualitative and qualitative and case study design. This study collects primary data through interview management and from secondary data, author makes projections based on financial statement reports. This study computes valuation using the discounted cash flow method. The results show that the value of Hospital ABC Equity about Rp.330.301 million, 679% higher than Equity in 2021. By calculating value of equity Hospital ABC, management could get additional data from preparation of acquisition process.

Keywords: valuation; discounted cash flow; business strategy;

Introduction

The domestic health industry continues to face significant challenges in meeting the need for health services while also achieving national health resilience (Sherman et al., 2022). The main challenges confronting the healthcare sector in Indonesia, as well as efforts to mitigate the impact of such activities of the health care industry and hospitals in Indonesia at the macro level, with the highest population in Southeast Asia, a high level of society, and a productive age to country economic development, can be used by Government as an opportunity to grow and move to develop its business with improving the quality of its services (Alam, Fawzi, Islam, & Said, 2021). To address this, the Minister of State-Owned Enterprises (SOE) formed an SOE Hospital Holding in order for SOE Hospitals to be integrated and have the same health service standard, and appointed PT Pertamedika IHC as an SOE Hospital Holding via Letter of the Minister of SOE of the Republic of Indonesia No. S-736/MBU/12/2016 dated December 21,2016 as a BUMN Hospital Holding (Wang, Li, Liu, Wu, & Sun, 2016).

In 2016, the consolidation of SOE Hospitals began. The vision of PT Pertamina Bina Medika IHC (hereinafter referred to as IHC) to build an Indonesian Health Corporation by realizing national health resilience is carried out in order to support the 5th RI. Program and 3 Pillars, namely healthy Indonesia. With a mission to build a collaborative ecosystem in the health business sector, take corporate actions on the health business, provide health services with the best standards and create new business models and digital-based health data integration (Kurniasih, Setyoko, & Saputra, 2022). The translation of Indonesia's health resilience is pursued by establishing a health sector ecosystem in accordance with strategic objectives by consolidating or integrating SOE hospitals and becoming agents of development (Andrews, Pritchett, & Woolcock, 2017). The integration of SOE Hospitals, one of the first steps in the formation of the SOE Hospital Holding, is carried out in four phases (Zhenxiang, 2014).

- a. Phase 1: The first stage is to establish a market position that can be realized in the short term (2019 2020), during which the development of the SOE Hospital Group Members will be carried out with the main goal of laying the groundwork for the SOE Hospital Group's future development. The initial target for the development of the IHC Group was PT Rumah Sakit Pelni.
- b. Phase 2: Stage to develop market share for scaling-up that can be realized in the medium term (by 2020), with 7 major state-owned hospitals identified as potential targets for the next stage of development in order to build a large and strong business scale. These-seven-hospital limited liability companies are part of Indonesia's large SOE Hospital group:
 - PT Pelindo Husada Citra PT Pelabuhan Indonesia III (Persero)
 - PT Krakatau Medika PT Krakatau Steel (Persero) Tbk.
 - PT Pelabuhan Hospital PT Pelabuhan Indonesia II
 - PT Rumah Sakit Bakti Timah PT Timah
 - PT Nusantara Medika Utama PT Perkebunan Nusantara X
 - PT Nusantara Sebelas Medika PT Perkebunan Nusantara XI
 - PT Rolas Nusantara Medika PT Perkebunan Nusantara XII
- c. Phase 3: Stage to achieve market leader status (in 2021 and beyond) and the establishment of a comprehensive SOE Hospital Group, with all SOE Hospitals becoming members of the group via the operatorship-membership concept with 18 SOE subsidiaries overseeing 35 hospitals. Furthermore, the operatorship collaboration with the teaching hospital, RS Universitas Indonesia
- d. Phase 4 : Increase the global value. IHC intends to acquire the target hospital through share ownership.



Figure 1 Map of Potential Distribution BUMN IHC Source: Yearly Financial Report of IHC

Phase IV includes Hospital ABC. Hospital ABC was requested to become an IHC subsidiary in 2022. Hospital ABC, on the other hand, is a business arm of Foundation ABC. As a result, Foundation ABC should form a private company called Perseroan Terbatas (PT) for Hospital ABC, and IHC should own Hospital ABC 's shares.

Hospital ABC would cover and serve healthcare for SOE employee in West Sumatera. Leaded by IHC and Hospital ABC become subsidiaries, PT IHC plans in conducting acquisition in 2023 as their strategic objective in phase IV. The purpose of this acquisition aligns with a mission to build a collaborative ecosystem in the health business sector, take corporate actions on the health business, provide health services with the best standards and create new business models and digital-based health data integration, Hospital ABC targeted to join and become subsidiaries. Beside Hospital ABC is one of the business units of Foundation ABC, the acquisition prosses would impact financial of the foundation and other business unit. Therefore, it is important to calculate the fair value valuation of Hospital ABC in the preparation of acquisition (Kissler, 2017).

Research Methodology

A research framework acts a guide to help this research get the solution that matches with research question and objectives and solve the issue. The research framework is started from business issue and then generate research question. Then the research framework is created as guidance to do this research (Sugiyono, 2018). Next historical data calculated and create projection of financial statement. Then calculate valuation and the result use to strategic recommendation and also implementation plan.

The methodology used in this research is both qualitative and quantitative method (Sugiyono, 2014). The quantitative method used on financial report for historical data and valuation calculation while qualitative method used to determine business environment analysis by interview Secretary of foundation ABC, Board of Director (BOD) Hospital ABC and Head of Department Hospital ABC. The first step to solving

a business problem is to analyse the business situation and study the literate. Analysis of the business situation will include Hospital ABC competitive advantage analysis to analyse the company environment. Flow stage as below:



Figure 2 Research Framework Source: Author Analysis

To analyse company business environment, author collect information and data from interviewing management. Author interviewed Board of Director (Chief Executive Officer and Chief of Operating Officer), Head of Departments and Secretary of Foundation (Peterson, Smith, Martorana, & Owens, 2003). Author calculates and analyse about valuation calculate data from company financial report 2017, 2018,2019, 2020 and 2021 and company road map (Rencana Kerja Jangka Panjang 2017 to 2021 and Rencana Kerja Jangka Panjang 2022 to 2026). Data healthcare industry collect from financial report for healthcare sector.

For quantitative data for calculate valuation, author use valuation model of (Damodaran, 2016), the approach taken in calculation the fair value of Hospital ABC in this case is discounted cash flow valuation. The formula as follows: FCFF = EBIT (1 - Tax Rate) + Depreciation - Capex - Δ net III.1 Working Capital Or FCFF = Cash Flow From Operating - Capex Where: EBIT = Earning before interest and taxes - Income from operation Depreciation = Depreciation Expense EBIT (1 - Tax Rate) = NOPAT = net Operating profit after tax Capex = Capital Expenditure

According to Damodaran, WACC is established by weighting the cost of each type of capital used. WACC is important when analysing the potential benefit of taking on acquiring company. WACC is the discount rate that a company uses to estimate its net present value. The formula is:

WACC = Wd x $CoD(1-t)$ + We x CoE	III.2
$Wd = \frac{Debt}{Debt + Equity}$	III.3
We= $\frac{Equity}{Debt+Equity}$	III.4

Where:

WACC	= Weighted Average Cost of Capital
Т	= Tax rate
CoD	= Cost of Debt
CoE	= Cost of Equity
Wd	= Weight of Debt
We	= Weight of Equity

To estimate the cost of shareholder fairness, fee of equity defined as the connection between systematic risk and expected return for assets, CAPM is used for the pricing of unstable securities generating anticipated return and calculate fee of capital. According to Damodaran, pricing of fairness is calculated by CAPM (Capital Asset Pricing model) as below:

$CoE = Rf + \beta$	(Rm - Rf)	III.5
Where:		
Rf	: Risk Free rate	
Rm	: Expected Market return on	Market
Rm- Rf	: Expected Risk Premium	
Rf Rm	: Expected Market return on	Market

The terminal value of a corporation is its predicted worth after the final year of the specified forecast period. The terminal value typically accounts for three-quarters of the overall implied valuation produced from a discounted cash flow (DCF) model (Poniachek, 2019). Thus, calculating the value of a company's free cash flow past the initial forecast stage with reasonable assumptions is an critical part of a DCF analysis that determines the model's reliability. Terminal value formulas as follows:

TV=([FCFn x (1+g)])/((WACC-g)) III.6

Where:	
TV	: Terminal Value
FCFn	: Free Cash Flow n year
g	: Growth
WACC	: Weighted Average Cost of Capital

After calculate PV of FCFF, author calculate for scenario analysis and Sensitivity Analysis for risk assessment. Scenario analysis is an approach to assessing risk that uses several alternatives to get a sense of variability among returns as measured by NPV Value. Scenario analysis determines how several different values effect NPV value. In capital budgeting, common scenario approached is to estimate the NPV with pessimistic (worst), probable (expected) and optimistic (best) as follows:

- 1. Best case: high revenue growth, high EBIT rate
- 2. Worst case: low revenue growth, low EBIT rate
- 3. Base case: average growth, average EBIT rate

Scenario analysis is determining how several different values of an independent variable affect a particular dependent variable altogether. Scenario analysis uses several possible alternatives to obtain, measured by NPV. Besides, the authors also calculate a sensitivity analysis that determines how different values of an independent variable affect a particular dependent variable individually. Sensitivity analysis is also called what if analysis. This analysis allows us to focus only on risks that give the high impact.

Results and Discussion

A. Analysis Business Environment

To understand about current business environment of Hospital ABC, environment business analysis will be conducted which are external environment analysis with PESTLE (Political, Economic, Social, Technology, Legal and Environment) and five force- Porters, for internal environment analysis with VRIO (Value, Rare, Imitate, and Organize) and SWOT (Strength, Weakness, Opportunities and Threat)

1. PESTLE Analysis.

- a. Political
- 1). Dynamic of regulation of tax

In healthcare industry, medicine and medical treatment have different treatment for Value Added Tax/VAT (PPN- Pajak Pertambahan Nilai). In December 2022, government issue Peraturan Pemerintah Republik Indonesia no. 49 tahun 2022 about Pajak Pertambahan Nilai Dibebaskan dan Pajak Pertambahan Nilai atau Pajak Pertambahan Nilai dan Pajak atas Barang Mewah. This regulation change treatment of medical treatment which before become non tax object and after become tax object and category as free tax. This would affect rules in hospital.

2). Membership program for Indonesian Healthcare Corporation (IHC) to take over Hospital ABC.

In 2021 Hospital ABC became membership of IHC and had benefit as membership program. Hospital ABC got efficient and lowest price of medicine, got opportunities to increase knowledge due to IHC train their employee frequently and also free for all IHC hospital members. IHC plan to acquisition Hospital ABC and stated it in stage 4 of IHC road map. IHC marker share are all the employee of Ministry of State-Owned Enterprise (SOE). All employee would appoint to do medical treatment in IHC groups.

3). Government intervention for price of public health insurance.

Government create BPJS Kesehatan to all cover insurance for Indonesian citizen. Government through BPJS Kesehatan manage the price and regulate the system. In Hospital ABC 60% of patient come from BPJS Kesehatan.

b. Economic

1). Membership from IHC to increase efficiency of medicine cost

Membership or subsidiaries of IHC increase efficiency of medical expense. IHC group get higher discount while purchasing medical with code IHC. In average, price of medicine group IHC lower 5 to 15% from regular price.

2). Delay of BPJS Kesehatan payment

More than a half patient of Hospital ABC came from BPJS Kesehatan. Hospital ABC working capital absorb to deliver service to BPJS Kesehatan segment. In end of October 2018, BPJS Kesehatan delayed for payment in time. It effected hospital become lack of cash on hand availability.

c. Social

1). Growth of community in Sumatra

After Covid-19 attacked, many sport community and social community arise. Such bicycle community could conduct event and hospital become healthcare provider partner. Hospital provided ambulance, paramedic and medical treatment to support the event. Hospital event revenue would increase.

2). Awareness of society to live healthy

Social awareness increases in healthy lifestyle. Healthy food and drink seller also increase. On the other hand, due to effected covid-19, people immunity decreases. Supplement and vitamin revenue in Pharmacy unit increase.

d. Technology

- 1). Rapid Innovation of healthcare facilities
- 2). Intelegancy Artificial (IA) technology for hospital services

e. Legal

1). Limited of doctor availability in morning shift

Hospital ABC as private hospital, has limited full time doctor. Full time doctor could deliver service and medical treatment in the morning clinic. Hospital ABC 90% of doctor as part time doctor and do medical treatment for inpatient and outpatient in the afternoon. With IHC membership and or subsidiaries, Hospital ABC would get full time doctor from all IHC group.

2). Dynamic of rules for BPJS Kesehatan potentially increase dispute of claim

BPJS Kesehatan regulated and controlled medical treatment of Indonesia citizen. The regulation often implements back dated. Hospital claim would delay and classify as dispute claim.

f. Environment

1). New normal life style potentially modified services in healthcare industry

2. Five Force-Porter's

To survive the competition of hospital industry in Indonesia, Hospital ABC need to identify and understand their competitive strength and position in the industry.

a. Supplier Power: Low

One pharmacy company owned one license medicine, effected low bargaining power. When Hospital ABC could not pay at the due date (overdue) Medicine would not send and wait until payment has been made. Hospital ABC also difficult to charge medical brand. Medicine brand in annually review and stated in hospital procedure. Doctor proposes the brand and make a receipt for their patient. When medicine did not available, rate of complain in pharmacy would increase.

b. Threat of new entry: Moderate

In 2020, Hermina group, mother and child hospital established in the centre of Padang city. Hermina has a well-known brand in Indonesia would decrease market share of mother and child services in Hospital ABC. On the other hand, mother and child services still the highest visitor for inpatient and outpatient in Hospital ABC. This would be different when Hospital ABC become IHC subsidiaries. As the well-known IHC named, would increase value of Hospital ABC

c. Buyer power: Moderate

Employee of holding company have ability to choose healthcare facilities (company gave ability to employee to choose) so that Hospital ABC was not as holding company employee captive market. Besides, Hospital ABC also receive and create agreement with national insurance to increase opportunities of the revenue.

d. Substitutes: Moderate

Hospital in Riau and Malaka have high standard of healthcare services. In Padang and West Sumatera, Hospital ABC categorize as general and complete of medical tools. Hospital ABC also receive inpatient from another province such Jambi and Bengkulu. In Padang, private hospital with complete medical instrument limited. On the other hand, public hospital gave a bad experience in services. Patient would wait and registry in Hospital ABC, even the same doctor with public hospital.

e. Competitive Rivalry: Moderate

There are several competitors in hospital and private hospital in Padang, although the market segment different from Hospital ABC. Besides, Hospital ABC create agreement with others hospital due to the limitation of bed number. When Hospital ABC could deliver the services, Hospital ABC would send patient to partner hospital.

3. Internal Environment Analysis, VRIO

a. Valuable

Healthcare industry is growing and support with government initiative. Beside number of hospital or healthcare public facility still limited. Hospital ABC also have a change to develop and manage SOE employee in Padang and West Sumatera.

b. Rare

SOE hospital is limited in Sumatera Island. In the middle of Sumatera Island, only 2 SOE's Hospital operated. SOE hospital plan to maintain and provide healthcare facility to SOE employee.

c. Costly to imitate

Hospital ABC has good brand image in West Sumatra due to Hospital ABC using "holding company" brand. Hospital ABC also has complete service and support with best techno ology. Hospital ABC still classify as "C" class hospital, beside the healthcare tools and service as complete as "B" class. Such Example, Hospital ABC has MRI, which is that tools classify in the "B" class hospital.

d. Organize to Capture Value

Hospital ABC is creating core value and conduct product diversify to maintain their growth graph and to get and increase potential market. Example, Hospital ABC develop agreement to corporation for Medical Check Up, which is the service maintain by laboratory or clinic. On the other hand, Medical Check Up would increase others service such follow up of the medical result with the specify doctor specialist.

			·		
Resources/ Capabilities	V	R	Ι	0	Competitive
					Consequences
The ability to get funding	Yes	No	No	No	Competitive Parity
Reliable GCG practice	Yes	Yes	Yes	Yes	Sustained
	100	1 0.0	100		Competitive Advantage
Having a strategic location	Yes	Yes	No	No	Temporary
					Competitive Advantage
Having a competitive patent	Yes	No	No	No	Competitive Parity
The ability of global human	Yes	Yes	Yes	Yes	Sustained
resource to develop innovation	105	105	105	103	Competitive Advantage
Having a good reputation	Yes	Yes	Yes	Yes	Sustained
based on awards received					Competitive Advantage

Table 1 VRIO Analysis

After identifying and analysis the resource and capability of Hospital ABC, the core resource of Hospital ABC is Reliable GCG, the ability of global human resource to develop and having a good reputation based on awards received. The core resource can be foundation of Hospital ABC for maintaining the business in the future.

4. SWOT Analysis

Author also assessing internal environment using SWOT analysis. the result as below:

Strength

- 1. Hospital ABC achieved the highest score of SNARS KARS
- 2. Hospital ABC have integrated system information
- 3. Hospital ABC have integrated system information with BPJS
- 4. Hospital ABC have agreement with medical distributor
- 5. Hospital ABC have newly medical technology
- 6. Hospital ABC have modern building design
- 7. Hospital ABC potentially develop human capital
- 8. Strategic location

Weakness

- 1. Taxed issue for 2015 and 2016
- 2. Information system out of date
- 3. Risk of bad debt for insurance and BPJS Kesehatan
- 4. Limited of cash on hand
- 5. High rate of employee turn-over
- 6. Limited activity of marketing to induce patient

Opportunities:

- 1. Growth of middle-class community in west Sumatera
- 2. Growth of awareness of health life style
- 3. Partnership with Indonesian Healthcare Corporation
- 4. Sinergy of foundation and hospital in Sumatera **Threats**:
- 1. Dynamic regulation of rules of taxed and BPJS
- 2. Limited number of doctors
- 3. Increasing of new hospital in Padang (Hermina and Siloam group)
- 4. Limited of cash from government for payment BPJS
- 5. Hospital in Riau and Malaka have high standard of services
- 6. Intervention of government for BPJS price

B. Company Financial Ratio Analysis

Hospital ABC financial ratio analysis in this study is evaluated through BUMN scoring framework. Profitability, liquidity, activity and solvency performance measurement is using data of data audited of 2017 to 2021. BUMN financial scoring indicator is calculated based on the decree of Ministry of SOE formulas. The result of the ratio calculation then categorized into scoring criteria in table 9 as follow:

Rating	Score	Adj. Score	Classification
AAA	Total Score (TS) > 95	TS > 66.5	Healthy
AA	80 < TS <= 95	56 < TS <= 66.5	Healthy
А	65 <ts<=80< td=""><td>45.5 < TS <= 56</td><td>Healthy</td></ts<=80<>	45.5 < TS <= 56	Healthy
BBB	50 <ts<=65< td=""><td>35 < TS <= 45.5</td><td>Less Healthy</td></ts<=65<>	35 < TS <= 45.5	Less Healthy
BB	40 <ts<=50< td=""><td>28 <ts <="35</td"><td>Less Healthy</td></ts></td></ts<=50<>	28 <ts <="35</td"><td>Less Healthy</td></ts>	Less Healthy
В	30 <ts<=40< td=""><td>21 < TS <= 28</td><td>Less Healthy</td></ts<=40<>	21 < TS <= 28	Less Healthy
CCC	20 <ts<=30< td=""><td>14 < TS <= 21</td><td>Unhealthy</td></ts<=30<>	14 < TS <= 21	Unhealthy
CC	10 <ts<=20< td=""><td>7 < TS <= 14</td><td>Unhealthy</td></ts<=20<>	7 < TS <= 14	Unhealthy
С	TS <=10	TS <= 7	Unhealthy

Table 2 Rating and Classification

The overall score of each year as bellow:

	Ratios						Score				
No	Rumus	2021	2020	2019	2018	2017	2021	2020	2019	2018	2017
1	Laba/Total Equitas	9.51%	2.85%	3.03%	4.29%	-0.85%	14.00	5.50	5.50	7.00	-
2	EBITDA / (Total aset- net fix asset)	18.2%	26%	28%	25%	31%	15.00	15.00	15.00	15.00	15.00
3	Cash/ current liabilities	90.7%	35.0%	38.7%	13.3%	14.9%	5.00	5.00	5.00	2.00	2.00
4	Asset lancar / hutang lancar	145%	184%	163%	126%	110%	5.00	5.00	5.00	5.00	4.00
5	AR x 365 / pendapatan	43	116	96	122	86	5.00	4.00	4.00	3.50	4.50
6	Inventory x 365 / pendapatan	19	33	29	19	21	5.00	5.00	5.00	5.00	5.00
7	Pendapatan per total aset	167%	130%	139%	137%	135%	5.00	5.00	5.00	5.00	5.00
8	Equity per total aset	34%	44%	40%	32%	30%	10.00	9.00	9.00	10.00	10.00
		Total					64.00	53.50	53.50	52.50	45.50
		Rating					AA	А	А	А	BBB
											Less
	Classification								Healthy	Healthy	Healthy

Table 3 Ratios and score

It can be seen that from 2018- 2020 is categorized as a healthy company. As Hospital ABC financial ratio performance classify as healthy, Hospital ABC has risk in financial performance in the future and would impact financial performance if the cause of the performance did not solve. In 2017 Hospital ABC performance calculation is lower than the rest of year (2018 to 2021). In 2017 ROE ratio about -0,85% and the highest ROE in 2021 about 9,51%. ROI Hospital ABC consistent in score 15, highest of ROI ratio because Hospital ABC launched in 2013 and in the following year Hospital ABC invest in medical tools to meet the market and regulation needed. In cash ratio the lower score was in 2017 and 2018 about 14,9% and 13,3% because Hospital ABC had long collection period and short payment period. At the time Hospital ABC created working capital financing with Account Receivable as guarantee. Current ratio Hospital ABC consistent in highest score in 2018 to 2021. Inventory ratio also in highest score with range ratio about 130% to 167%.

C. Valuation

Discounted Cash Flow, Assumption:

The Assumption used in making the projection in Hospital ABC are as follows:

- 1. Sales growth for Hospital ABC projection year 2022 to 2031value from average growth rate from 2017 to 2021. In average growth about 17,46% and decrease gradually until the terminal year.
- 2. Earnings Before Interest and Tax (EBIT) calculate from historical data and increase to EBIT targeted based on company road map.
- Reinvestment value calculated based on sales to capital ratio about 4,95 and sales increase from the preview year. In the next 10 years reinvestment about Rp. 9.613 million.
- 4. Income tax rate calculated from histories tax. Tax rate about 22% from fiscal earning. In calculation from previews year, fiscal earning always higher than

Source: author calculation

financial report earning. If compare with earning before tax and the tax paid, calculated that tax paid about 29,23%.

- Estimate portion of Equity and Debt were 40% and 60% using average beta from HEAL (Hermina Hospital) and MIKA (Mitra Keluarga Hospital) data from 2018 to 2021 monthly stock price.
- 6. Risk Free rate using 10 year government bond, data PHEI about 7.01%
- Equity Risk Premium Indonesia about 9.23% data from Damodaran Country Risk Premium access data January 6, 2023

Hospital ABC revenue projection started from the average of revenue growth in 2017 to 2021 about 17,46% and decrease until in the terminal year assuming equal with average GDP 2017 to 2022 about 4.38%. For Operating margin data calculate from historical data. Tax rate about 27.46% and sales to capital ratio about 4,95. FCFF 2022 to 2031 as below:

Table 4	Projection Value
Year	Projection FCFF
	(in Rp. Million)
2022	Rp. 1.756
2023	Rp. 6.717
2024	Rp. 12.634
2025	Rp. 19.425
2026	Rp. 27.019
2027	Rp. 30.241
2028	Rp. 33.376
2029	Rp. 36.426
2030	Rp. 39.400
2031	Rp. 42.315
Total	Rp. 624.197

To get value of the firm, author calculate FCFF NPV. NPV calculation need a discounted rate which uses the risk of the FCFF. This discounted rate calculation uses the Weighted Average Cost of Capital (WACC). Author estimate portion of Equity and debt were 40% and 60%, beta data from stock Hermina Hospital (stock code HEAL)

and Mitra Keluarga Hospital (MIKA) data on average data HEAL and MIKA stock price from 2018 to 2021 stock price monthly. Market return in average 1.27%, with Leverage Beta 0.605 using projected debt to equity ratio (1.5), and risk-free rate 7.01% using 10 years government bond yield. Cost of equity calculated about 12.08%. Cost of debt calculated with loan rate about 8% p.a and taxed rate 27,46%, the cost of debt about 5,8%. Weighted average cost of capital was 8.31%. After the amount of FCFF and discounted rate, author calculate Net Present Value.

Table 5 Present V Year 2022 2023 2024 2025 2026 2027 2028 2029 2030 2031	Value of PCFF (Rp. Million)
Year	PV (FCFF) in Rp. Million
2022	Rp. 1.621
2023	Rp. 5.725
2024	Rp. 9.942
2025	Rp. 14.113
2026	Rp. 18.123
2027	Rp. 18.728
2028	Rp. 19.083
2029	Rp. 19.228
2030	Rp. 19.202
2031	Rp. 19.039
Total PV FCFF	Rp. 144.808

The following table for NPV of FCFF projection Hospital ABC;

Besides, the assumption on the terminal value in this study is related to the value of growth (g). The stable growth rate in this study using free-risk government 10 years bond amount about 6.8%. Based on the data, calculation of terminal value from the above assumption become:

$$TV(Rp.million) = \frac{24.557}{(8.31\% - 4.38\%)} = Rp. 624.197$$

PV of TV (Rp. million) = Rp. 280.848

932

As the FCFF projection and Terminal Value is obtained, the value of equity can be measure using the present value from the cashflow. Value as follow:

Value of the Firm (Rp.million) = Total NPV FCFF + TVValue of the Firm(Rp.million) = Rp. 141.808 + Rp. 280.848= Rp. 425.652

<i>Value of the Equity</i> (Rp.million) = Value of the Firm – Debt	
Value of the Equity (Rp.million) = $Rp.425.652$ - Rp. 95.351	
Value of the Equity (Rp.million) = Rp. 330.301	

In this research, author use scenario analysis and sensitivity analysis. Scenario analysis shows that if the three a change in all factors that occur, NPV effected. Worst scenario is the worst performance in year 2017 to 2021 from base and best scenario swing +20% from base. Calculation as below:

		in %		in Rp. Million				
				NPV	NPV	NPV		
	Worst	Base	Best	Worst	Base	Best		
Revenue								
Growth	-14.42%	17.46%	20.95%	59,002	330,301	381,098		
Target EBIT	5.61%	10.81%	12.97%	106,673	330,301	423,003		
C 1 1	C 1 1							

Table 6 Scenario Analysis

Source: Author Calculation

NPV above show that NPV range Rp.330.301 million and best scenario Rp.423.003 million. Range from the worst to best case in Rp.59.002 million. For sensitivity analysis as result below:

Table 7 Sensitivity Analysis

	Current Assumption	+20% Swing	-20% Swing	Current NPV	+20% Swing NPV	-20% Swing NPV	Percentage +20% Swing	Percentage - 20% Swing	Absolut
Growth terminal Year	4.38%	5.26%	3.50%	330,301	346,500	314,798	4.90%	-4.7%	0.10
WACC	8.31%	9.98%	6.65%	330,301	236,693	474,880	-28.34%	43.77%	0.72

Growth in the terminal year when swing +20% will increase NPV 4.9% and swing - 20% will decrease NPV -4.7%. in WACC when swing +20% will decrease NPV - 28.34% and when WACC swing -20% will increase NPV 43.77%.

Conclusion

Hospital ABC as affiliation of SOE enterprise company, would make agreement to be subsidiaries of holding hospital from State-Owned Enterprises Ministry. This research will conclude that:

- 1. Hospital ABC has a sustainable competitive advantage because Hospital ABC has the fourth attributes. Hospital ABC has valuable resource that prepare to manage SOE employee in Padang, West Sumatra and become one and only hospital of SOE in Padang. IHC member or ownership hospital would manage all employee of SOE and the company would appoint Hospital ABC for medical services. As affiliation of Cement Company, Hospital ABC manage and organize efficiently. Holding cement company regularly monitor Hospital ABC performance. Hospital ABC weakness would become strength when Hospital ABC become IHC subsidiaries. Such as the risk of bad debt from BPJS Kesehatan, Hospital ABC would follow IHC regulation and procedure to conduct services to the patient. Hospital ABC would has full time doctor because the source of the doctor come from all province in Indonesia. Hospital ABC would become a subsidiary of IHC and all program of the SOE hospital will also conduct in Hospital ABC.
- 2. Hospital ABC categories the financial performance as less healthy using BUMN Financial Scoring framework No. KEP-100/MBU/2002 with rating BBB to AA in 2017 to 2021. The lower score at profitabilily ratio (Return of Equity) and activity ratio (Cash Ratio). Valuation of Hospital ABC using Discounted Cash Flow, Value of Equity about Rp.330.301 or increase 697% from equity in 2021. showed that NPV ranged from worst to best scenario about Rp.316.329 million with best scenario Rp.423.003 million and worst scenario Rp.59.002 million. Based on sensitivity analysis, the change of WACC would have high impact then increase of terminal growth. IHC acquisition plan would increase IHC capital

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