COMPARATIVE STUDY: FINANCIAL PERFORMANCE ANALYSIS BEFORE AND DURING COVID-19 PANDEMIC OF INDONESIA STATE-OWNED ENTERPRISE PT TELEKOMUNIKASI INDONESIA TBK & PRIVATE ENTERPRISE PT INDOSAT TBK FOR THE PERIOD OF 2016 – 2020

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ABSTRACT

The development in Indonesia is transforming into the new era of Industry 4.0 which is marked by the increasing connectivity and intense digital flows in the Information, Communication & Technology industry. Alongside the agility to maintain in the emerging digital market, the capabilities of companies to adapt to unforeseen occurrence is the key to solid business strategies, particularly in the midst of pandemic The Coronavirus (COVID-19). In assessing the industry, this study analyses the financial health of two foremost State-Owned Enterprises & Private Enterprise in Telecommunication sector, PT Telekomunikasi Indonesia Tbk (PT Telkom Tbk) & PT Indosat Ooredoo Hutchison Tbk (PT Indosat Tbk). The data used are collected from the published audited report. Financial ratios that are stated in the Decree of Indonesia Ministry of State-Owned Enterprises No.KEP-100/MBU/2002 are used to analyse the financial health of the companies, which are 1) return on equity, 2) return on investment, 3) cash ratio, 4) current ratio, 5) collection period, 6) inventory turnover, 7) total asset turnover, 8) total equity to total asset. This research result shows that from 2016 – 2020 PT Telkom Tbk financial condition healthy ratings were (AA, AA, AA, AA), meanwhile for PT Indosat Tbk ratings were (A, A, BB, A, BB). During Covid-19 in 2020, PT Telkom was stable, whereas there was a declining trend in PT Indosat. In conclusion, PT Telkom Tbk shows better financial performance on the majority of aspects in Profitability, Liquidity, Activity, and Solvency than PT Indosat before and during Covid-19, merely on Activity Performance Days Inventory that PT Telkom scored slightly lower.

Keywords: Telecommunication industry, financial performance, financial ratio, State-Owned Enterprise, Private Enterprise, Decree of Indonesia ministry of state-owned enterprise.

INTRODUCTION

The development in Indonesia is transforming into the new era of Industry 4.0 which is marked by the increasing connectivity and interaction (BPKM, 2017). Trends in Industry 4.0 as emerging digital technologies are Blockchain technologies, Three-dimensional printing, Internet of Things, 5G Mobile Broadband, Cloud Computing, Automation & Robotics, Artificial Intelligence and Data Analytics (United Nations, 2019). As this progressive development, companies should be able to be agile to the technological challenge.

The continuance innovation requires a selected amount of investment and financial budgeting for a range of period. To remain able to seize market share in the telecommunication service industry, the companies are required to have the ability to show good corporate financial performance, as a basis consideration for investors to invest in the company, particularly for public companies owned by the Indonesian government (Hastuti et al., 2021). Notably in the telecommunication sector, the notable state-owned enterprise in this field is PT Telekomunikasi Indonesia Tbk (PT Telkom) and non-state-owned enterprise PT Indosat Ooredoo Hutchison Tbk (PT Indosat).

Alongside the agility to maintain in the emerging digital market, the capabilities of companies to adapt to unforeseen occurrence is the key to solid business strategies, particularly in the midst of pandemic The Coronavirus (COVID-19). The outbreak of Covid-19 has caused widespread concerns and financial difficulties around the world (Lawley & Wagner, 2020). Some regulations have been implemented by the Government to reduce the number of people affected & risk of severe health conditions, including large scale social restrictions that obligate people to have every activity including learning and working to be carried out from home.

The major shift has indirectly changed lifestyles and needs particularly accelerating people's digital adoption. Many people at any age started to familiarize themselves with digital applications that can support productivity at home. This condition causes a shift in the needs of the community, where the internet is a very important need at this time. As a state-owned and private enterprise engaged in the telecommunications sector, PT Telkom Indonesia (Persero) Tbk (Telkom) and PT Indosat Tbk are one of the many ICT business players who are required to adapt in the midst of this pandemic disruption. After planning to transform into a digital telecommunication company (digital teleco) since last year, the COVID-19 pandemic has provided space for digital acceleration, requiring companies through its infrastructure, platforms, and digital services to accelerate the transformation effort and become an enabler for every community activity during the pandemic (Dob, 2020).

The differential impact of the COVID-19 pandemic in 2020 on the industrial sales or financial conditions needs to be examined quantitatively based on financial reports released on the Indonesia Stock Exchange (IDX). The performance of public companies is the basis for making investment decisions for investors and creditors (Devi, et al., 2020). In measuring the financial condition, financial ratio analysis is one of the effective tools to acknowledge the financial condition progression of a company, cross sectional

and comparative analysis as it has been used across industries such as banking, oil, and construction companies research in Indonesia (Myšková & Hájek, 2017; Daryanto et al., 2020).

This research aims to understand about the financial health condition specifically in the telecommunication industry before and during Covid-19 outbreak using five-year period data from 2016 to 2020. The analysis focused on the Telecommunication companies in Indonesia because the major growing number of internet users each year in Indonesia. In 2020, Indonesia contributed 42% from USD 44 billions of USD 105 billion the total value of internet-based economies in South East Asian countries (Kementerian Informatika & Komunikasi Republik Indonesia, 2021).

In order to get an in-depth view about the industry, this research uses comparative analysis between a State-Owned Enterprises and a Private Enterprise in the telecommunication sector, namely PT Telkom & PT Indosat. The Decree of the Ministry of SOEs No. KEP-100/MBU/2002 is used in assessing & scoring the financial performance. This study is beneficial to provide relevant information to potential investors and corporate finance to highlight the key business strategies that will further accelerate from shifting lifestyle due to Covid-19 up to recent days, as the major determinant for business planning, financial budgeting & investment products in the future.

LITERATURE OVERVIEW

Financial Performance

Financial statement is as a written record(s) to communicate its business activities and its financial performance (Murphy, 2020). There are three basic financial statements: the balance sheet, the income statement, and the cash flow statement as the basis essential of any business. The statements will only show numbers if without further being analyzed. All analyses of accounting records contain comparisons to make the variety meaningful, which basically are supposed to shed mild on how nicely employers are accomplishing its objectives (Anthony et al., 2012). This compares to all financial statements data known as financial performance analysis. This comparison research also will add financial knowledge in academic literature because currently no previous study has incorporated the financial performance analysis of the state-owned enterprise company PT Telkom in the midst of Coronavirus outbreak, nor has any previous research examined the comparison between PT Indosat in the same Covid-19 crisis.

Information & Communication Technology (ICT) and Telecommunication Industry in Indonesia

The Information and Communication Technology (ICT) enterprise has come to be one of the most outstanding and critical signs in figuring out the monetary improvement of a region. Indonesia's ICT Development Index has increased every year from 4.24 (2012), 4.83 (2015), 5.07 (2018) to 5.32 (2019), 5.59 (2020) (Badan Pusat Statistik, 2020). Rising ICT Development Index shows increased use of ICT to increase Indonesian productivity and expand economic activity (Agustina & Pramana, 2019). The value of internet-based economies in Southeast Asian countries reach USD105 billion or around Rp. 1,470 trillion (Rp. 14,000 per dollar) in 2020 (Kementerian Informatika & Komunikasi Republik Indonesia, 2021). A total of USD 44 billion or Rp. 616 trillion contributed by Indonesia.

This year's Asosiasi Penyelenggara Jasa Internet Indonesia (APJII) / Association of Indonesian Internet Service Providers survey (Kementerian Informatika & Komunikasi Republik Indonesia, 2020) also noted that Indonesia's internet users have grown to 196.7 million people, with a penetration rate of 73.7% of the population, an increase of 8.9% from the two previous years. Large internet users can be a good market to drive the growth of e-commerce and the digital economy more broadly.

PT Telekomunikasi Indonesia TBK

According to PT Telkom official website www.telkom.co.id (2020), PT Telekomunikasi Indonesia Tbk or abbreviation as PT Telkom Indonesia (Persero) Tbk (Telkom) was established in 1965 which then legally become State-owned Limited Liability Company ("Persero") in 1991. PT Telkom is a State-Owned Enterprise (BUMN) which is engaged in information and communication technology (ICT) services and telecommunications networks in Indonesia. Telkom has divided its business into 3 Digital Business Domains (1) Digital Connectivity: Fiber to the x (FTTx), 5G, Software Defined Networking (SDN)/ Network Function Virtualization (NFV)/ Satellite, (2) Digital Platforms: Data Center, Cloud, Internet of Things (IoT), Big Data/ Artificial Intelligence (AI), Cybersecurity, (3) Digital Services: Enterprise, Consumer.

PT. Indosat Ooredoo Hutchison Tbk

In PT. Indosat Tbk. (2019) annual report states that Indosat is a non-governmental business that was established in 1967. Indosat's main activities are focused on providing telecommunication, informatics, and convergence technology services in Indonesia. In 2018, Indosat was acquired and became a part of a global telecommunications company called Ooredoo. Under Ooredoo and a few subsidiaries, Indosat provides fixed telecommunication services and digital services, such as the 4G LTE. Indosat Ooredoo have a variety of products and services such as (1) Mobile: Internet and communication Networking (ICT), (2) Internet of Things and M2M, (3) Information Technology (IT) Services, (4) Connectivity, (5) Satellite. (6) Fixed Voiced: IP based voice technology for cloud-based PBX, (7) Fixed Internet, (8) IMX: First mobile ad-exchange.

Previous Research on Financial Performance

Financial ratio can be identified as evaluating the relationship amongst items in the financial statement using a mathematical equation (Weygandt et al., 2012). There are four (4) different financial ratios classification: (1) Liquidity ratio; (2) Profitability ratio; (3) Solvency Ratio; (4) Activity Ratio (Weygandt et al., 2012).

There are past research studies that use the financial ratios to compare the financial performance and health between two companies in a certain industry. Furthermore, there are several studies that compare the financial health and performance between SOEs and

Non-SOEs from various industries. An example is a research study by Daryanto et al. (2020) that focuses on a time series analysis and comparing the financial performance of SOE and private enterprise in the steel, as well as in aviation (Daryanto, 2018), oil & gas industry (Daryanto & Samidi, 2018). Similar to this research, some studies have been implemented in financial performance comparison between PT Telkom & PT Indosat, but no previous study has been found specifically before and during the Covid-19 pandemic.

The Ministry of State-Owned Enterprise Decree No. KEP-100/MBU/2002

The Ministry of State-Owned Enterprise (SOE) or commonly known as Badan Usaha Milik Negara (BUMN) issued a decree which contains the regulation and analysis parameter in the decree No. KEP-100/MBU/2002 which contains an evaluation system that can be applied to all SOEs that are in the financial and non-financial sector. The evaluation system assesses three different aspects of an SEO, those aspects that will be evaluated are the financial, operational, and administration.

In the financial evaluation, the SEOs are divided into two different sectors, the infrastructure sector and the non-infrastructure sector. Both of these sectors have its own weighting system, the infrastructure sector carries a total weight of 50, whereas the non-infrastructure sector carries a total weight of 70. This research study focuses on the evaluation of the financial aspect of PT Telkom Tbk (SOE) and PT Indosat Tbk (NON-SOE), and compare the analysis results of both companies. Although PT Indosat is a non-state-owned enterprise, the evaluation system from the Decree still can be used to evaluate the financial health of Indosat. An example is a research study done by (Daryanto et al, 2020), which is a comparative study in the financial performance of an SOE and Non-SOE in the steel industry.

RESEARCH METHODOLOGY

1.Purpose of research

This research is intended to evaluate and assess the effect of the Covid-19 pandemic to PT Telkom & PT Indosat overall business performance through the company's financial statements. The research output provides recommendations intended for both companies as a consideration to make future strategic business decisions towards the industry.

2. Methodology

To have a better understanding about the growing Information, Communication, and Technology (ICT) industry in Indonesia, the author took the population of the company that engaged in ICT industry in Indonesia. The author found that there were 45 state-owned enterprises that classified into Telecommunication & Media by Ministry State-Owned Enterprise and 9 private ICT enterprises that listed on Indonesia Stock Exchange (Ariyanti, 2021). This research sample will focus on the notable Telecommunication companies to get comprehensive insight that covers wide market segment, the notable state-owned enterprise in this field is PT Telekomunikasi Indonesia Tbk (PT Telkom) and non-state-owned enterprise PT Indosat Ooredoo Hutchison Tbk (PT Indosat).

This research study uses descriptive financial ratio analysis in order to analyze, measure, describe, and evaluate the financial health conditions of SOEs PT Telkom & private enterprise PT Indosat before and during The Covid-19 outbreak. Both companies are commonly known for their business activity in the telecommunication industry. The source of data used for the analysis was secondary data collected from the company's audited annual financial statements from 2016 until 2020. Unaudited financial statements are not included in this study. The collected data was divided into two periods, PT Telkom & PT Indosat before Covid-19 used data only from 2016 until 2019, and during Covid-19 used 2020 annual report.

The measurement method used in this research is by adopting the financial health evaluation issued KEP-100/MBU/2002 by the Ministry of State-Owned Enterprise or BUMN. Both companies were categorized as Non-Infrastructure companies based on Ministry SOE' categorization that impacted in the scoring result. All variables used as ratio measurement scales were taken from the decree. In addition, this decree was used to validate the financial health condition level of those enterprises within categorization as very healthy level (AAA, AA, A), healthy level (BBB, BB, B), or unhealthy level (CCC, CC, C).

The overview of conducting research steps in this framework given as follows:

- 1. Gathering data collection from audited financial statement of PT Telkom Tbk & PT Indosat Tbk
- Analyse the financial performance before & after Covid-19 of each company using KEP-100/MBU/2002 by the Ministry
 of State-Owned Enterprise
- 3. Compare the financial performance from the two companies

Table 3.1. Total Weight Score

Table 3.2. Total Health Indicator

INDICATOR	WIGHT SCORE
ROE	20
ROI	15
Cash Ratio	5
Current Ratio	5
Collection Period	5
Inventory Turnover	5
Total Asset Turnover	5
Total Equity to Total Asset	10
Total Weight Score	70

Category	Rating	Score
Healthy	AAA	TS > 95
Healthy	AA	80 < TS < 95
Healthy	A	65 < TS < 80
Less Healthy	BBB	50 < TS < 65
Less Healthy	BB	40 < TS < 50
Less Healthy	В	30 < TS < 40
Unhealthy	CCC	20 < TS < 30
Unhealthy	CC	10 < TS < 20
Unhealthy	С	TS < 10

Source: The Ministry of Stated Owned Enterprise Decree KEP-100/MBU/2002

Several ratios will be used to analyze the data as follows:

1. Profitability Ratio:

Profitability ratio is the ratio to analyze how much profit the company can generate. The profitability calculation should be put beyond profit margin as a single measure of performance. Instead, the investment employed to produce that income could also affect the overall performance (Anthony et al., 2012).

Return on Investment or commonly known as ROI is a financial measurement used to calculate the return that investors receive in return for their investment cost, in simple terms to measure cost-benefit of an investment. (CFI, 2020)

Return on Investment:
$$\frac{EBITDA}{average\ total\ capital} x\ 100\%$$

Return on equity (ROE) is used to measure a company's annual return to evaluate investment returns. In addition, the ROE ratio also provides information on how the company utilizes financing from equity to expand the business. (CFI, 2020)

Return on equity (ROE):
$$\frac{Net\ income}{Shareholders\ Equity} x\ 100\%$$

Table 3.3. Return on Investment Assessment Score Table 3.4. Return on Equity Assessment Score

Return on Investment (%)	Non Infrastructure	Return on Equity (%)	Non Infrastructure		
18 < ROI	15	15 < ROE	20		
15 < ROI < 18	1	13 \ KOE	20		
13 < ROI < 15	12	13 < ROE < 15	18		
12 < ROI < 13	10,5	11 < ROE < 13	16		
10,5 < ROI < 12	9	9 < ROE < 13	14		
9 < ROI < 10,5	7,5	J TROE 113	17		
7 < ROI < 9	6	7,9 < ROE < 9	12		
5 < ROI < 7	5	6,6 < ROE < 7,9	10		
3 < ROI < 5	4	5,3 < ROE < 6,6	8,5		
1 < ROI < 3	3		0,0		
0 < ROI < 1	2	4 < ROE < 5,3	7		
ROI < 0	1	2,5 < ROE < 4	5,5		

Source: The Ministry of Stated Owned Enterprise Decree KEP-100/MBU/2002.

2. Liquidity Ratio

Liquidity Ratio is a ratio of liquid assets to current liabilities. Liquid ratio is a more rigorous test of liquidity than the current ratio because it eliminates inventories and prepaid expenses as a part of current assets (Bhunia et al., 2011). Usually, a high liquid ratio indicates that the firm is liquid and has the ability to meet its current or liquid liabilities in time, whereas a low liquidity ratio represents that the firm has low power to meet its liquid liabilities.

Current ratio:
$$\frac{Current\ asset}{Current\ liabilities} \ge 100\%$$

Cash ratio:
$$\frac{Cash + marketable\ securities}{Current\ liabilities} \times 100\%$$

Table 3.5. Current Ratio Assessment Score

Table 3.6. Cash Ratio Assessment Score

Current Ratio (%)	Non Infrastructure	Cash Ratio (%)	Non Infrastructure		
Current Ratio > 35	5	Cash Ratio > 35	5		
25 < Current Ratio < 35	4	25 < Cash Ratio < 35	4		
15 < Current Ratio < 25	3	15 < Cash Ratio < 25	3		
10 < Current Ratio < 15	2	10 < Cash Ratio < 15	2		
5 < Current Ratio < 10	1	5 < Cash Ratio < 10	1		
0 < Current Ratio < 5	0	0 < Cash Ratio < 5	0		

Source: The Ministry of Stated Owned Enterprise Decree KEP-100/MBU/2002.

3. Activity Ratio

The Activity Ratio indicates the effectiveness of a company in the use of assets in generating sales (Widyastuti, 2019). The greater the ratio shows the more effective use of assets owned by the company.

Collection Period or also known as the number Days receivable turnover is known as how many days does it take for a company to collect payments from the customers (Schweser, 2020). A high collection period means that the customer is slow in paying their payables. In result, there will be a subsequent amount of capital tied up in an asset. On the other hand, a low collection period suggests that the company's credit policy(s) might be too strict which can affect the sales. In conclusion, with these considerations it's desirable for a company to have a collection period close to the industry norms (Schweser, 2020).

Collection Period =
$$\frac{Trade\ Receivable}{Revenue} \times 365$$

Days Inventory refers to the number of days it takes for a company to process its inventory, or can be also known as the number of days inventory on hand. A high level of day's inventory means that a great amount of capital is tied to the inventory, and there might be a possibility that the inventory is obsolete. Whereas a low inventory level could indicate the firm has an inadequate stock which can potentially cause a loss of sales (Schweser, 2020).

Days Inventory =
$$\frac{Inventory}{Revenue} \times 365$$

Table 3.7. Collection Period Assessment Score

Table 3.8. Days Inventory Turnover Assessment Score

Collection Period (days)	Adjustment (days)	Non Infrastructure	Inventory TO (Days)	Adjustment (days)	Non Infrastructure
CP < 60	CP > 35	5	ITO < 60	ITO > 35	5
60 < CP < 90	30 < CP < 35	4,5	60 < ITO < 90	30 < ITO < 35	4,5
90 < CP < 120	25 < CP < 30	4	90 < ITO < 120	25 < ITO < 30	4
120 < CP < 150	20 < CP < 25	3,5	120 < ITO < 150	20 < ITO < 25	3,5
150 < CP < 180	15 < CP < 20	3	150 < ITO < 180	15 < ITO < 20	3
180 < CP < 210	10 < CP < 15	2,4	180 < ITO < 210	10 < ITO < 15	2,4
210 < CP < 240	6 < CP < 10	1,8	210 < ITO < 240	6 < ITO < 10	1,8
240 < CP < 270	3 < CP < 6	1,2	240 < ITO < 270	3 < ITO < 6	1,2
270 < CP < 300	1 < CP < 3	0,6	270 < ITO < 300	1 < ITO < 3	0,6
300 < CP	0 < CP < 1	0	300 < ITO	0 < ITO < 1	0

Source: The Ministry of Stated Owned Enterprise Decree KEP-100/MBU/2002.

To measure how effective a company utilizes its total asset to generate revenue is through the total asset turnover ratio. Different industries have different total asset turnover ratios as a result of the nature of the business activity. A capital-intensive business might have a low total asset turnover which is close to 1.

Total Asset Turnover =
$$\frac{Revenue}{Capital\ Employed} \times 365$$

Table 3.9. Total Asset Turnover Assessment Score

Total Asset TO (%)	Adjustment (days)	Non Infrastructure
TATO < 120	TATO > 20	5
105 < TATO < 120	15 < TATO < 20	4,5
90 < TATO < 105	10 < TATO < 15	4
75< TATO < 90	5 < TATO < 10	3,5
60< TATO < 75	0 < TATO < 5	3
40 < TATO < 60	TATO < 0	2,5
20 < TATO < 40	TATO < 0	2
TATO < 20	TATO < 0	1,5

Source: The Ministry of Stated Owned Enterprise Decree KEP-100/MBU/2002.

4. Solvency Ratio

Solvency pertains to the company's ability to meet the interest costs and repayment schedules associated with its long-term obligations (Anthony et al., 2012).

Asset to Equity ratio informs the scale of funding that derives from equity for financing the company's assets.

Asset to Equity:
$$\frac{Total\ Equity}{Total\ Asset} x\ 100\%$$

Table 3.10. Equity to Asset Assessment Score

Equity to Asset (%)	Non Infrastructure
ETA < 0	0
0 < ETA < 10	4
10 < ETA < 20	6
20 < ETA < 30	7,25
30 < ETA < 40	10
40 < ETA < 50	9
50 < ETA < 60	8,5
60 < ETA < 70	8
70 < ETA < 80	7,5
80 < ETA < 90	7
90 < ETA < 100	6.5

Source: The Ministry of Stated Owned Enterprise Decree KEP-100/MBU/2002.

RESULTS & DISCUSSION

Profitability Performance

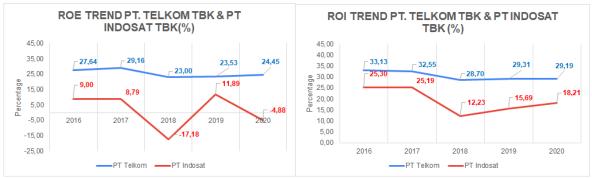


Figure 4.1. ROE of PT Telkom Tbk & PT Indosat Tbk

Figure 4.2. ROI of PT Telkom Tbk & PT Indosat Tbk

Figure 4.1. & 4.2. Shows ROE & ROI Trend Ratio of PT Telkom Tbk & PT Indosat Tbk for the period 2016 - 2020. ROE PT Telkom respectively were 27.64%, 29.16%, 23.00%, 23.53%, 24.45% and PT Indosat were 9.00%, 8.79%, -17.18%, 11.89%, -4.88%. From the data, it can be concluded that the highest ROE ratio of PT Telkom is in 2017 at 29,16%, whereas PT Indosat is in 2019 at 11.89%. In 2018, PT Telkom & PT Indosat simultaneously experienced the lowest ROE levels of 23.00% and -17.18%, respectively. This is due to PT Indosat experiencing a loss on the year amounting to Rp2.08 Trillion.

In the year of 2020, when Covid-19 Outbreak and impact major lifestyle change of the people, PT Telkom could maintain and even increase its ROE level as of 0.92% to 24,45%, otherwise PT Indosat's ROE declined drastically of 16.77% to -4.88%. This is as well due to the company loss PT Indosat experienced in the 2020 amount of Rp0.63 Trillion. According to the Ministry of SOEs No. KEP-100/MBU/2002 (2002), PT Telkom scored higher for five-year analysis compared to PT Indosat. Particularly in the year during Covid-19, PT Telkom provides a better return on equity compared to PT Indosat.

The following measurement of Profitability Performance is on the ROI ratio. In this ROI ratio, PT Telkom scored by 33.13%, 32.55%, 28.70%, 29.31%, 29.19% and for PT Indosat 25.30%, 25.19%, 12.23%, 15.69%, 18.21% for year 2016 - 2020. 2016 became the highest peak for both PT Telkom Tbk & PT Indosat Tbk, with 33.13% and 25.30% respectively. As well as the same year both companies experienced the highest return, PT Telkom & PT Indosat experienced the same year for the lowest ROI levels in 2018, PT Telkom amounted for 28.70% and PT Indosat 12.23%. However, in 2020 during the Pandemic period, PT Indosat was able to increase ROI with an increase of 2.52% to 18.21%, while PT Telkom Tbk was unable to maintain its ROI level and experienced a slight decrease of 0.12% to 29.19%. Even though PT Telkom had its decrease during Pandemic, according to the Ministry SOEs (2002) PT Telkom scored a higher ROI ratio in 2020 compared to PT Indosat which can be interpreted as PT Telkom provided a better return on assets they managed.

Liquidity Performance

The two figures below entail the liquidity performance from both companies. The data in figure 4.3. shows the Cash Ratio of PT Telkom Tbk is relatively decreased from year to year. In contrast to PT Telkom, PT Indosat's chart shows a fluctuation of liquidity performance.

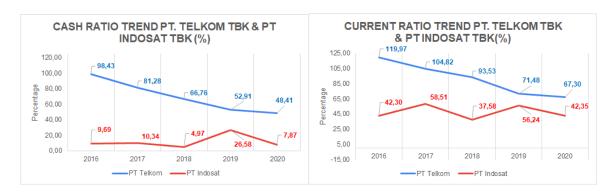


Figure 4.3. Cash Ratio of PT Telkom Tbk & PT Indosat Tbk Figure 4.4. Current Ratio PT Telkom Tbk & PT Indosat Tbk

The Cash Ratio for PT Telkom were 98.43%, 81.28%, 66.76%, 52.91%, and 48.41% respectively, whereas for PT Indosat were 9.69%, 10.34%, 4.97%, 26.58%, 7.87%. PT Telkom had its peak in 2016 with 98.43%, whereas in PT Indosat is in 2019 with 26.58%. For the lowest ratio, PT Telkom had the score in 2020 for 48.41%, otherwise in 2018 for PT Indosat with the lowest at 4.97%. In the midst of the pandemic in 2020, PT Telkom met its lowest Cash Ratio with 48.41%, as well as PT Indosat with 7.87%.

By using the Ministry of SOEs No. KEP-100/MBU/2002 scoring standard, in 2020 PT Telkom with 48.41% attain in the highest score category with minimum range of >35% and receive a value of 5 for Non-Infrastructure industry. Meanwhile for PT Indosat with 7.87% categorized in 5-10% ratio and receive a value of 1 out of 5 range score. Based on the Ministry of SOEs scoring method, PT Telkom performed better Cash Ratio which means a better ability to repay its short-term debt or current liabilities with cash or cash equivalents such as marketable securities (Daryanto et al., 2020).

Besides their Cash Ratio, different trends are also found in their Current Ratio, relative degradation for PT Telkom and fluctuating trend for PT Indosat. For the Current Ratio, PT Telkom ratio were 119.97%, 104.82%, 93.53%, 71.48%, 67.30% and for PT Indosat were 42.30%, 58.51%, 37.58%, 56.24%, and 42.35%. In the year of pandemic in 2020, PT Telkom had its lowest ratio of 67.30%, meanwhile PT Indosat experienced the third highest ratio for 42.35%. During Covid-19, both companies scored the lowest range on Ministry of SOEs (2002) scoring standard that is mentioned for current ratio <90% attains a value of 0 out 5 range score. Even though PT Telkom performed better than PT Indosat, both companies were still unable to provide sufficient current assets to pay short-term debt during 2020. This is a declining trend for PT Telkom since early in 2016 & 2017 it scored 119.97% and 104.82%, receiving a score of 4 and 3 respectively. On the other hand, the overall five year for PT Indosat are categorized in the lowest range and receive a value of 0 every year which indicates that PT Indosat from 2016 - 2020 have difficulty in managing their liquidity performance.

Activity Performance

1. Collection Period

Figure 4.5 gives information about Collection Period Trend of PT Telkom & PT Indosat in 2016-2020. PT Telkom had its Collection Period with roundup by 23, 26, 32, 32, and 30 days respectively, whereas in PT Indosat respectively by 34, 47, 46, 42, 34 days. Even though there were fluctuations of CP ratio for both companies, PT Telkom & PT Indosat received a stable score of 5 based on Ministry of SOEs (2002) scoring standard for overall five years.

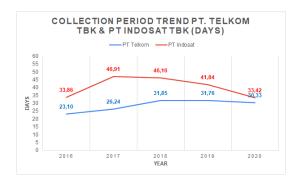


Figure 4.5. Collection Period PT Telkom Tbk & PT Indosat Tbk

In 2020, both companies simultaneously achieved better performance in reducing Collection Period with PT Telkom reduced approximately two days to 30 days and PT Indosat reduced in eight days to 34 days. According to the Ministry of SOEs (2002) scoring standard, during Covid-19 both companies attain the highest score of 5 within \leq 60 days. It means to say that the two companies, despite the pandemic situation, are more efficient to shorten the duration of receiving payments from its clients in terms of account receivable (A/R), or more disciplined to regulate the payment terms on the agreed contract.

2. Days Inventory

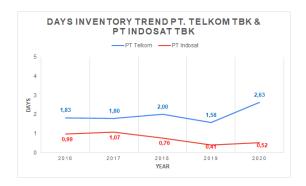


Figure 4.6. Days Inventory Trend of PT Telkom Tbk & PT Indosat Tbk

Figure 4.6 shows the Days Inventory Trend of PT Telkom Tbk & PT Indosat Tbk in 2016-2020. In contrast to the Collection Period, the trend for the number of days inventory is considerably stable. The days inventory for PT Telkom with roundup were 2, 2, 2, 2, 3 days, whereas for PT Indosat were 1, 1, 1, 0, 1 days. The Days Inventory of PT Telkom Tbk met its lowest ratio in 2019 with 2 days and the highest 3 days in the year of pandemic 2020. In PT Indosat Tbk, the highest Days Inventory ratio in 2017 with 1 days with the lowest in 2019 with 0 days (round up of 0.41 days), as same as the lowest year of PT Telkom.

Days Inventory score shows the duration of how many days in a given period a company is able to replace the inventories to be sold to the customer or clients; or the speed a company can sell the inventory. Through 2020, PT Indosat performed better with lower Days Inventory (1 days) than PT Telkom (3 days). PT Telkom had an increase of 1.05 days in 2020, while PT Indosat had a slim increase of 0.11 days in the same year. However, both companies received a stable score of 5 out of 5 based on Ministry of SOEs (2002) scoring standard for overall five years, for scoring within 60 days. Despite the good management of the company, the type of industry also takes a part. The telecommunication industry doesn't necessarily stock goods, compared to retail industries such as daily goods supermarkets or fashion retail (Fernando, 2021). That means the company doesn't need to keep a large number of inventories. The longer the inventory is held, the higher the holding fee so that it will be crucial for enterprise performance.

3. Total Asset Turnover

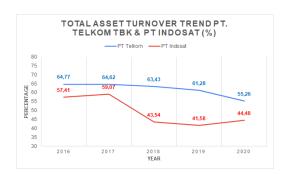


Figure 4.7. Total Asset Turnover Trend PT Telkom Tbk & PT Indosat Tbk

Figure 4.6 illustrates PT. Telkom & PT Indosat Total Asset Turnover (TATO). The chart indicates that both companies tend to have a declining TATO trend throughout five years. In detail, the TATO ratio for PT Telkom were 64.77%, 64.62%, 63.43%, 61.28%, & 55.26% and for PT Indosat were 57.41%, 59.07%, 43.54%, 41.58%, and 44.48%. The highest TATO for PT Telkom was in 2016 with 64.77% and in 2017 with 59.07% for PT Indosat, the lowest was in 2020 55.26% and in 2019 with 41.58% respectively. In the year of Covid-19 outbreak, PT Telkom experienced its lowest TATO and the biggest decline 6.02% to 55.26% than previous years, whereas on the contrary PT Indosat achieved better TATO with 2.9% increase to 44.48%. Although PT Telkom experienced the biggest decline in the year of Pandemic, PT Telkom still outperformed PT Indosat meaning that PT Telkom operates more efficiently in using its assets to generate sales revenue compared to PT Indosat, though as the worst TATO performing year compared to previous four years for PT Telkom.

Based on the Ministry of SOEs (2002) scoring standard, in 2020 the companies scored 3.5 of 5 for PT Telkom and 3 for PT Indosat which scored in the middle range in the scoring. The previous years were not much different for both companies, PT Telkom scored between 3 (2016-2019) and 3.5 (2020), while PT Indosat scored were 2.5 (2018 & 2019), 3 (2017 & 2020), and 3.5 (2016). The overall five-year performance indicated that both companies still scored between in the middle score range which means the company management have not been able to maximize assets to generate sales revenue.

Solvency Performance

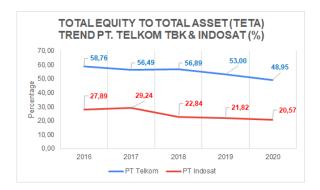


Figure 4.8. Total Asset Turnover Trend PT Telkom Tbk & PT Indosat Tbk

The above figure 4.8. Shows Total Equity To Total Asset (TETA) ratio trend of PT Telkom & PT Indosat in 2016 - 2020. The ratio in detail for PT Telkom were 58.76%, 56.49%, 56.89%, 53.00%, and 48.95%, while for PT Indosat were 27.89%, 29.24%, 22.84%, 21.82%, and 20.57%.

According to Ministry SOEs (2002) scoring standard, PT Telkom scored 8.5 of 10 (2016 - 2019) and 9 in the year of Covid-19 2020. Meanwhile PT Indosat scored stable in 7.25 of 10 for five years. According to this scoring standard, the best score range TETA ratio falls between $\leq 30\%$ - <40%. In the year of Covid-19, PT Telkom scored higher of 9 compared to PT Indosat of 7.25. The overall higher score of PT Telkom for five years meaning that the company could perform better in managing to fund their assets through equity. However, a higher ratio than the ideal is between $\leq 30\%$ - <40% of equity meaning the company is still not on an ideal portion and perhaps rely more than the ideal portion on their own capital and find the difficulties to attain other funding sources. For PT Indosat, the lower TETA ratio for five-year analysis indicates that the company may not have ideal capital, then they have to rely mostly on other sources of funding other than their own capital.

VALIDATION TESTING

Table 5.1 indicates the overall performance assessment of PT Telkom Tbk. Based on the five years analysis, PT Telkom could maintain its healthy financial performance. For the five-year analysis, PT Telkom rating falls to "AA" with Healthy ratings every year. The performance tends to fluctuate throughout the year, with the highest indicator being in the year 2016 with a total score 65.5 and the lowest in 2019 with 61.5. In the year of Covid-19 outbreak, PT Telkom in reverse could bounce back its score from 61.5 as the lowest year in 2019, to 62.5 in 2020. However, there's no difference in the rating category before Covid-19 in 2016 - 2019, and during the outbreak in 2020.

Table 5.2 shows the total score of PT Indosat which indicates its financial health in the span of five years (2016-2020). Similar to Telkom, PT Indosat's financial health fluctuates year to year. In comparison to telkom there are two out of the five years that the company's financial health rating falls to "BB", which can be categorized to be "less healthy". As is shown in the table, Indosat's lowest score is in the year 2018 with a score of 43.21 which causes the company to be "less healthy". However, Indosat managed to recover its financial condition the following year (2019) and had the highest score in the five years analysis with a total weight of 76.07. In spite of the recovery in 2019, PT Indosat suffers another downturn in 2020 during the year of the covid-19 pandemic. Behold financial ratios, PT Telkom shows better financial performance on the majority of aspects in Profitability, Liquidity, Activity, and Solvency than PT Indosat. Merely in Activity Performance of Inventory Days, PT Telkom scored slightly lower meaning that PT Telkom requires longer time to generate revenue from its inventory.

Valuation Testing PT Telkom Tbk	2016		2017		2018		2019		2020	
	Ratio	Score	Ratio	Score	Ratio	Score	Ratio	Score	Ratio	Score
ROE	27.64	20	29.16	20	23.00	20	23.53	20	24.45	20
ROI	33.13	15	32.55	15	28.70	15	29.31	15	29.19	15
Cash Ratio	98.43	5	81.28	5	66.76	5	52.91	5	48.41	5
Current Ratio	119.97	4	104.82	3	93.53	1	71.48	0	67.30	0
Collection Period (CP)	23.10	5	26.24	5	31.85	5	31.76	5	30.33	5
Days Inventory	1.83	5	1.80	5	2.00	5	1.58	5	2.63	5
Total Asset Turnover (TATO)	64.77	3	64.62	3	63.43	3	61.28	3	55.26	3.5
Equity to Asset (TETA)	58.76	8.5	56.49	8.5	56.89	8.5	53.00	8.5	48.95	9
Total Score		65.5		64.5		62.5		61.5		62.5
Total Weight		93.57		92.14		89.29		87.86		89.29
Status		AA		AA		AA		AA		AA
Health Level	Hea	lthy	Hea	lthy	Hea	lthy	Hea	lthy	Hea	lthy

Table 5.1. Test Result for the period 2016 - 2020 of PT Telkom Tbk

2016 2019 2018 2020 Valuation Testing PT **Indosat Tbk** Ratio Score Ratio Score Ratio Score Ratio Score Ratio Score 0 ROE 9.00 12 8.79 12 -17.1811.89 16 -4.880 ROI 25.30 15 25.19 15 12.23 10.5 15.69 13.5 18.21 15 2 Cash Ratio 9.69 1 10.34 4.97 0 26.58 4 7.87 1 42.35 Current Ratio 0 37.58 0 0 42.30 0 58.51 56.24 0 Collection Period (CP) 5 5 5 33.42 5 33.86 46.91 46.16 41.84 5 5 5 5 5 5 Days Inventory 0.99 1.07 0.76 0.41 0.52 Total Asset Turnover 3 2.5 3 57.41 3.5 59.07 43.54 41.58 2.5 44.48 (TATO) Equity to Asset (TETA) 7.25 29.24 7.25 22.84 7.25 21.82 7.25 20.57 7.25 27.89 **Total Score** 48.75 49.25 30.25 53.25 36.25 **Total Weight** 69.64 70.36 43.21 76.07 51.79 Status BB RR A A A **Health Level** Healthy Healthy Less Healthy Healthy Less Healthy

Table 5.2. Test Result for the period 2016 - 2020 of PT Indosat Tbk

CONCLUSION, RECOMMENDATION, & LIMITATION

A. Conclusion and Recommendation

The goal of this research study is to compare the financial health in the telecommunication industry of SOEs PT. Telkom & private enterprise PT Indosat before and during Covid-19 pandemic using the year 2016 - 2020 financial data. Furthermore, this research study is adopting the 8 financial ratio assessment issued by Indonesia's Ministry of State-Owned Enterprise or commonly referred as the Badan Usaha Milik Negara (BUMN) in the KEP-100/MBU/2002 decree.

Based on the result, PT Telkom performed exceedingly compared to PT Indosat before and during the Covid-19 pandemic. In the general view of this study result, PT Telkom Tbk is categorized in healthy condition (AA) for overall five years analysis with slightly fluctuated score. On the other hand, PT Indosat Tbk showed the healthy condition (A) for the period 2016, 2017, 2019, and the less healthy condition (BB) in the year 2018 & 2020. In the year of Covid-19 outbreak, it doesn't affect the score in PT Telkom, contrarily it has increased one-point score from 2019. Meanwhile, in PT Indosat it has a significant decline of 17 points that resulted in the company as financially less healthy compared to last year with healthy ratings.

The most notable difference between these two companies is their level of profitability and liquidity. Telkom attained more stable profitability for five years compared to PT Indosat that experienced loss in 2018 & 2020. On their liquidity performance, Telkom managed to keep a high level of cash ratio & current ratio. On the other hand, in the Activity Performance Days Inventory, PT Telkom scored slightly lower than PT Indosat. For overall conclusion, PT Telkom shows better financial performance on the majority of aspects in Profitability, Liquidity, Activity, and Solvency than PT Indosat.

In order to get an in-depth view about the industry, this research uses comparative analysis between a State-Owned Enterprises and a Private Enterprise in the telecommunication sector, namely PT Telkom & PT Indosat. The Decree of the Ministry of SOEs No. KEP-100/MBU/2002 is used in assessing & scoring the financial performance. This study is beneficial to provide relevant information to potential investors and corporate finance to highlight the key business strategies that will further accelerate from shifting lifestyle due to Covid-19 up to recent days, as the major determinant for business planning, financial budgeting & investment products in the future.

This research result emphasize the global narrative that the digital adoption of global citizens is accelerating, due to digitalization and particularly in the midst of Covid-19. A lot of activities rely heavily on Information, Communication, and Technology (ICT) companies such as Telkom and Indosat to stay connected. Therefore, this era is an opportunity for these companies to expand and maximize their business ventures by investing in newer technology to cater the increasing and evolving demand. This study analysis with 8 financial ratios is also beneficial to provide relevant information to potential investors and corporate finance to highlight the financial strategies as the major determinant for business planning, financial budgeting & investment products in the future.

B. Limitation

This research study uses the KEP-100/MBU/2002 decree from the Ministry of State-Owned Enterprise. The first limitation is this research study only examines and analyzes the financial aspect of Telkom and Indosat. Therefore, the conclusion and recommendation of this study is specifically discussing the financial aspect and not involving the administrative and operational

aspect of the evaluation system. Also, this research study focuses on descriptive analysis and not analyzing the significance of relationship before and during Covid-19 pandemic by using the regression analysis method. Due to time limitations of this research, the period that is used to compare the financial performance taken from Telkom's and Indosat's annual report. To have a more comprehensive and detailed analysis, it is suggested to use a quarterly report about the most recent financial condition of the Covid-19 pandemic (until Q3 2021). This research specifically focus on Indonesia's telecommunication companies, further research could emphasize the potential growing internet-user market in other countries, as well comparison between countries in wider sub-region e.g. Southeast Asian countries, Asian countries, etc.

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