# VALUATION OF PRIVATIZED STATED OWNED ENTERPRISE IN INDONESIA: THE CASE STUDY OF TELKOM

**By**

**Moh. Mustajab**

THESIS

Submitted to
KDI School of Public Policy and Management
in partial fulfillment of the requirements
for the degree of

MASTER OF BUSINESS ADMINISTRATION

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Professor David J. Behling

*Dedicated to my Father and my Mother (deceased),*
*my Brother*
*and my Darling*

# ABSTRACT

In general, the performance of more than half of SOEs in Indonesia is not sound. To improve SOE's performance and efficiency competitiveness, the government uses two approaches. The first is strengthening the market orientation of the SOEs and the second is privatization of SOEs. Privatization has been a key component of structural reform programs in Indonesia. The question is what happens to the SOEs after privatization? Does SOE performance improve, increasing the shareholder (government) value, or does performance deteriorate, destroying value? To help answer this question, the thesis looks at TELKOM as a case study and goes through detailed analysis of the past performance and forecasted future performance.

The thesis found that since the financial crisis in 1997, the government's privatization efforts have been motivated primarily to obtain government revenue rather than to improve SOE's performance. Never the less, in the case of TELKOM, real its performance improved after privatization as indicated by improvements in both sales per employee and in line in service per employee. The financial performance of TELKOM also improved after privatization as the liquidity ratio rose, asset management was stable and profitability increased. The Future value of TELKOM will be particularly influenced by changes in telephone rates permitted by government authorities and by the degree of growth in cellular telephone usage. Using discount cash flow (DCF) model as a valuation framework, the thesis estimates that TELKOM is likely to add to shareholder value.

## ACKNOWLEDGEMENT

Many people have given their precious time, ideas and generous support to this thesis. First of all, I want to thank Professor David Behling for his intensive consultation during the thesis writing. I also want to express my gratitude to KOICA as an institution who gave me scholarship to study in KDI School. I am also grateful to Steven Chung and Giovanni Villafuerte for English editing, Nguyen Thulien for discussion and brainstorming and all KOICA students for companionship during the thesis writing.

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# CHAPTER I

# INTRODUCTION

The characteristic of the Indonesian economy during the past political regime (the new order or Soeharto regime) was a heavy dependence on several big companies (well known as conglomerate) and state owned enterprises (SOEs). During decade of the 1970s and 1980s, the state owned enterprises and conglomerate companies became the motor of economic activity in Indonesia.

In general, the government was the main player in economic activity with full control over the SOEs. As majority stockholder of the SOE, the government holds big power and influence on a company's decisions, including corporate strategy. The government also influences conglomerate companies directly and indirectly through its competition policy. The government facilitate big companies that can enter the international market to transact robust exports in selected sectors that the governments believe have great promise towards export.

Starting from the 1990s, the government changed economic strategy to a market driven economy. From this decade, the privatization program became the policy of the government within a larger economic restructuring program. Along with privatization program, several facilities that were given to conglomerate companies

were also abolished.

By the mid 1990s, eight SOEs had been privatized, which raised USD$4.3 billion through two main methods; Initial Public offering (IPO) and sales to strategic partners, proceeds of which were reinvested into the enterprises. Supporting the program, the Ministry of State Owned Enterprises was established in 1998 and controls approximately 144 SOEs.

When a company is privatized, some method must be used to estimate how much the company is worth, that is to find its real value. The thesis selects PT TELEKOMUNIKASI INDONESIA (or well known as TELKOM) as a case study. The main reason for choosing TELKOM as sample case study is that the government controlled TELKOM in the past and then privatized it partially. Thus an analysis can be made of how partial privatization impacts corporate value. Thus, besides privatization itself, another issue that will be covered in this thesis is whether it will be beneficial to a company, give benefits to the public as consumers and give benefit to the government as a stockholder.

**The Purpose of the Thesis**

The purpose of this thesis is to illustrate how a SOE should be valued and how the valuation depends upon different scenarios of the future, with the different

scenarios incorporating different assumptions as to the degree and timing of further privatization.

Second purpose is to consider the various costs and benefits of privatization, from the viewpoint of the consumer, the company and the government.

The aim of writing the thesis itself was to fulfill the requirements of the master degree of Strategy and Management at the School of Public Policy and Management, Korea Development Institute.

**The Methods and Strategy**

Research will be based on a case study from one of Indonesian stated owned enterprise, namely PT. TELEKOMUNIKASI INDONESIA Tbk., a single and monopolistic domestic telephone operator.

The method of the thesis for valuing the company will be based on two steps. The first step is assessing the recent performance of the company and the second step is to forecast the current value of the company given assumption and forecasts of the company's future performance.

In the analyzing the past financial performance, this study will focus on a six-step analysis: current market value, value as is, value with internal improvement, value with external improvement, value with growth opportunity and potential value.

To meet the purpose of the thesis, analyzing the impact of privatization on the value of company and benefit to the government and public, the research will explore government policy of privatization, the company's performance, corporate strategy and managerial policy itself.

The source of data for this thesis derives mainly from the company's published annual reports. The range of data selected from 1995 just before privatization process until 2000. Other data collected from other sources also will be included as supporting data.

**Structure of The Thesis**

The structure will divide the thesis into five chapters. Chapter one will explain introduction of the thesis, describing the background of research, purpose of thesis, methods and strategy and structure of thesis.

Chapter two will develop more about SOEs and the privatization program. The first part will explore the role of SOEs in the Indonesian economy and the government's role in the SOEs: it describes SOEs performance in general. The second part will describe the privatization program; explore government policy on privatization, real aspect of privatization and progress of privatization in Indonesia.

Chapter three will describe the theory and methodology used in this research,

describing the framework of valuation. Basically there are two types of valuation: first is measurement of past performance and second is estimation at the value of a company.

In chapter four, we will work with the case study of TELKOM, one of the biggest SOEs and also one of the biggest companies in Indonesia. The first part of the chapter will overview TELKOM, explore its business activity and relationship with the government. The second part will analyze the restructuring process of the company including the privatization process of the company as a main part of restructuring. The third part of chapter IV will analyze the past performance of TELKOM and will work with the methodology described in chapter three.

Chapter five is forecasting future performance of TELKOM, finding out the value driver of future performance, building assumptions and scenario of future performance and estimating the value of the company through the methodology that is described in chapter three.

Chapter six is a summary of the thesis, conclusion, suggestions and recommendations for the company, the government and another SOEs.

# CHAPTER II

# PRIVATIZATION PROGRAM OF STATED OWNED ENTERPRISE

## A. SOEs in the Indonesian Economy

During the past two decades of Indonesian economic development, the economy was marked by government involvement in the business sector. The Indonesian Economy can still be characterized as a mixed economy despite more than a decade of privatization and deregulation programs, in which state owned enterprise and government directed monopolies operated alongside private business.

The use of public enterprises has been a constituent of Indonesian economic development policy, based on article 33 of the 1945 constitution, which stipulates: “sector of production which are important for the country and affect the life of the people shall be controlled by the state”.

Historically, the first SOE was the “Bank Negara 1946” established in 1946, which is the first bank, founded by the government. The government then continued to establish more SOEs in several sectors like banking and tourism. In 1958, by Government Regulation PP No. 23 (1958) government takeover of foreign companies operated in Indonesia under the program of nationalization of foreign companies. The important issue of this program was that the government not only controlled the sector

of production which were important for the country and affected the life of the people, but also controlled companies that were commercially business oriented.[1]

The nationalization of foreign companies increased the scope of direct economic activity of the government; while in the 1970s during the oil price boom, the government was able to set up new SOEs. Throughout these years, the government intervened heavily in the production and distribution of goods by means of regulation, restriction and control of private business activities. To support the development policy, the government created many SOEs in almost all sectors like cement, telecommunication, fertilizer, iron etc. The government gaves roles to SOEs as an agent of development and put the control of each SOEs under the ministry in each sector in which the SOE operated.

**A.1. Role's of SOEs in The Indonesian Economy**

The general objectives of the SOEs; as formulated in the Government Regulation PP No. 3 (1983), are to act as an agent of development, to contribute the state revenues, to provide basic goods and services to the general public, to undertake so-called "pioneer activities" which promote or complement private sector development, and to generate income and profits.[2]

[1] Kuffal, Harry Sampurno, *Quo Vadis Penataan BUMN*, acrticle from http://bumnreview.com, September 2000

[2] Pangestu, Mari, *The Role of Private Sector in Indonesia: Deregulation and Privatization* in the

There are some figures that give some indication of the economic importance of the public sector role in the Indonesian economy during the 1970s and 1980s:

- By 1980, 69 percent of investment came from the public sector.
- In 1988, the state owned around 50 percent of the shares in the mining industry, 100 percent of shares in oil and gas, 100 percent of shares in public utilities, 50 percent of shares in transport and communication, and 65 percent of shares in banking and finance.
- Public enterprises dominated the financial sector: during 1976-1982 they received 93-98 percent of the central bank's liquidity credit, and state bank credits accounted for 85-90 percent of all bank credits in the 1974-1982 period. State banks had the biggest network of branches throughout the country, and co-operated closely with the other public enterprises which were required to keep their funds only with state-owned banks[3]

Nowadays, Indonesia's state owned enterprise sector includes several hundred enterprises. The majority of these are small, public service enterprises owned by local and provincial governments. In addition, water authorities and some other types of public infrastructure are owned by local governments. The national government owns

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article "Public Sector in Indonesia", ciptanet international

[3] Pangestu, Mari, ibid

numerous public welfare institutions including hospitals, educational, research, and cultural institutes. Given its special status, Pertamina, the state oil and gas monopoly, is overseen by the state Department of Oil and Gas. The state owned banking sector is currently undergoing merger, restructuring, and recapitalization by the Indonesia Bank Restructuring Agency (IBRA).

Excluding these enterprises, there are currently 144 SOEs under the management of the Ministry of Investment and State Owned Enterprises. These enterprises cover a range of industries and vary in size from large, national monopolies and public infrastructure enterprises to relatively small service companies. Industries include financial services, insurance, services, construction, engineering, toll roads, manufacturing (including cement, paper, and textiles), pharmaceuticals, trading and distribution, tourism, industrial estates, telecommunications, airlines, airports, ports, electric power, steel, shipbuilding, shipping, mining, plantations, fertiliser, fisheries, and forestry.[4]

Among the largest SOEs are TELKOM (the domestic telecoms monopoly), Indosat (the international telecoms monopoly), PLN (the electric power monopoly), Krakatau Steel, Aneka Tambang (gold and nickel mining), Timah (tin mining), Garuda (the national airline), the airports, and the ports companies.

[4] Pangestu, Mari, ibid

## A.2. SOEs Performance

Based on the criteria for SOEs performance measurement established by the government through Government Regulation No. 5 (1998), three criteria are envisaged:

1. **Profitability**, defined as the ability of the company to achieve a positive rate of return and to earn a profit
2. **Liquidity**, defined as the potential of the enterprise to fulfil short-term liabilities, and
3. **Solvency**, defined as the potential of the company to fulfil all short-term and long-term, obligations

Based on these three criteria, the SOEs were to be classified as very sound, sound, less sound, and not sound. These criteria are limited to measure financial parameters only (excluding e.g. aspects of the quality of goods and services, or of efficiency in resource utilization), and do not take into account external factors which may have an impact on the enterprise performance, like the setting of prices and other market interventions by the government.[5]

From Table 2.1, we can see that the share of SOEs categorized as Not Sound is more than 30%. This means that more than 30% of the SOEs are underperformances and less than 30% of SOEs are perform.

[5] from the article *"Public Sector in Indonesia"*, Ciptanet International

**Tabel 2.1 Performance Evaluation of SOEs**

| Performance rating | | Very sound | Sound | Less sound | Not sound | Total |
|---|---|---|---|---|---|---|
| 1986/1988 | Amount of SOEs | 19 | 13 | 20 | 49 | **101** |
| | *%* | *18.81* | *12.87* | *19.80* | *48.51* | ***100*** |
| 1989 | Amount of SOEs | 32 | 21 | 16 | 32 | **101** |
| | *%* | *31.68* | *20.79* | *15.84* | *31.68* | ***100*** |
| 1990 | Amount of SOEs | 39 | 19 | 16 | 27 | **101** |
| | *%* | *38.61* | *18.81* | *15.84* | *26.73* | ***100*** |
| 1994 | Amount of SOEs | 52 | 33 | 35 | 62 | **182** |
| | *%* | *28.57* | *18.13* | *19.23* | *34.07* | ***100*** |
| 1995 | Amount of SOEs | 49 | 29 | 31 | 69 | **178** |
| | *%* | *27.53* | *16.29* | *17.42* | *38.76* | ***100*** |
| 1996 | Amount of SOEs | 48 | 33 | 30 | 55 | **166** |
| | *%* | *28.92* | *19.88* | *18.07* | *33.13* | ***100*** |
| 1997 | Amount of SOEs | 41 | 33 | 29 | 57 | **160** |
| | *%* | *25.63* | *20.63* | *18.13* | *35.63* | ***100*** |

Source: 1986-1990 figures: Mardjana (1993) in Ciptanet International article.

1994-1997 figures: Office of Ministry of SOEs

**Table 2.2. Dividend and Income tax revenue from SOEs**

**Fiscal year 1990/91 – 1995/96 (in billion of IDR)**

| | 1990/91 | 1995/96 |
|---|---|---|
| SOEs dividend as government revenue | 1,096 | 1,477 |

| | | |
|---|---|---|
| Total non-tax revenue | 2,383 | 7,801 |
| % Contribution of SOEs dividend to total non tax revenue | 46% | 41.2% |
| SOE's income tax | 1,438 | 2,020 |
| Total national income tax | 3,489 | 20,520 |
| % Contribution of SOE's income tax to total national income tax | 41.2% | 9.8% |

Source: Dwidjowiyoto (2001)

Another method to evaluate the SOE's performance is to assess their impact on public finance like contribution to government revenue as presented in table 2.2. In 1990/91, contribution from SOE's dividend to national non-tax revenue was 1,096 billion IDR[6] from 2,383 billion IDR total non-tax revenue or 46% from total non-tax revenue. In 1995/96, contribution from SOE's dividend was 1,477 billion IDR from 7,801 billions IDR total non-tax revenue or 14% from total non-tax revenue. Contribution from SOEs dividend to non-tax revenue from 1990/91 – 1995/96 decreased to 32% or decreased on average 6.4% each year.

National revenue from SOEs income tax to total tax revenue in 1990/91 was 1,438 billion IDR to 3,489 billion IDR or 41.2% from total tax revenue. SOEs income tax in 1995/96 was 2,020 billion IDR and national tax revenue was 20,520 billion IDR or 9.8% from total tax revenue. Contribution of SOEs income tax revenue to total national tax revenue from 1990/91 to 1995/96 decreased to 31.4%.

**Table 2.3 Asset, Profit and ROA of SOEs in Indonesia (in billion of IDR)**

[6] IDR or Indonesian Rupiah is Indonesian currency

| Year | Asset | % change | Profit | % change | ROA |
|---|---|---|---|---|---|
| 1988 | 124,000 | | 5,200 | | 4.19% |
| 1989 | 144,000 | 16% | 6,600 | 27% | 4.58% |
| 1990 | 179,000 | 24% | 8,300 | 26% | 4.64% |
| 1991 | 201,000 | 12% | 6,800 | -18% | 3.38% |
| 1992 | 231,000 | 15% | 6,300 | -7% | 2.73% |
| 1994 | 291,950 | | 8,028 | | 2.75% |
| 1995 | 312,802 | 7% | 9,323 | 16% | 2.98% |

Source: Baswir (1998), Dwijowiyoto (2001)

If we look at return on asset (ROA) of SOEs as presented in table 2.3, it seems that ROA of SOEs is very low. In the year 1988 to 1990, ROA of SOEs is around 4%, decreased in year 1991 to 3.38% and below 3% from 1992 to 1995. Trend of percentage change in profit is decline from 1988 to 1995 and negative growth in 1991 and 1992.

From three method measurements of SOEs performance explained before, it seems that SOEs performance was under perform in general. From this reason, the ministry of SOEs tried to improve the SOEs performance with restructuring programs under International Monetary Fund (IMF) support. Under the Memorandum of Economic and Financial Policies between the government of Indonesia and the IMF, as part of condition from IMF's programs and loans to Indonesia, the government will formulate a comprehensive framework for public sector reform, which includes the

speeding up of the privatization of more SOEs not only by public listing of shares, but also by direct placement of shares with a core investor.

The envisaged policy initiatives reflect the strong pressure from the IMF to strengthen the performance of SOEs and to review the need for their continuing existence as SOE.

**A.3. Need for Restructuring**

Even though the SOEs have played an important role during the past two decades, the government tended to leave economic policy based on state intervention and make substantial shifts to deregulation and privatization in the 1990s. Issues about deregulation and privatization became popular starting from the 1980s, but implementation of privatization was done only in the 1990s. Privatization of SOEs is a central element of the new economic policy regarding market structure, which was initiated by a sharp drop in oil-generated government revenue and the need to strengthen the export sector of the Indonesian economy.

In 1998, the government established new state ministry for SOEs empowerment called “Menteri Negara Pemberdayaan BUMN” to assist SOEs in the management of reform and privatization. The ministry now takes control of all SOEs switched from ministries from each sector.

Government's motivation of SOEs restructuring policy seems to have three motives. First is the need for greater government revenue. Second is pressure from international institution (IMF) and third is preparing the Indonesian economy for the era of free trade according to global and regional trade agreements like the World Trade Organization (WTO), the Asia Pacific Economic Cooperation (APEC) and the ASEAN Free Trade Area (AFTA).

## B. Privatization Program

### B.1. Why Privatization? Theory and Evidence

Not only in Indonesia, privatization has been a key component of structural reform programs in both developed and developing economies. The aim of such programs is to achieve higher microeconomic efficiency and foster economic growth, as well as reduce public sector borrowing requirements through the elimination of unnecessary subsidies.

Microeconomic theory tells us that incentive and contracting problems create inefficiencies due to public ownership, given that managers of state-owned enterprises pursue objectives that differ from those of private firms (*political view*) and face less monitoring (*management view*). Not only are the managers' objectives distorted, but the budget constraints they face are also softened. The soft-budget constraint emerges

from the fact that bankruptcy is not a credible threat to public managers, for it is in the central government's own interest to bail them out in case of financial distress.

At the microeconomic level, the empirical evidence strongly supports the view that privatization has positive effects on profitability and efficiency. It also shows that capital expenditures tend to increase after privatization. The evidence on firm-level employment is mixed --though for large firms employment seems to rise after divestiture.[7]

Another study done by Juliet D'Souza, William Megginson and Robert Nash indicates the performance improvement after privatization as presented in table 2.4. The study consists of 118 firms (from 29 countries and 28 industries), privatized via public share offering between 1961 and 1995, to address issues why these performances occur. They find that higher levels of employee ownership are associated with greater increases in capital expenditure after privatization. The results of their study indicate that leverage increases more for firms with higher foreign ownership, those located in developing economies and those in countries with rapidly growing economies.[8]

**Table 2.4 Performance Change in Privatized Firms**

| Variables | N | Percentage of Firms | Z-statistic for |
|---|---|---|---|

[7] Sheshinski, Eytan and López-Calva, Luis Felipe, *Privatization and its Benefits: Theory and Evidence*. Development Discussion Paper, Harvard Institute for International Development, 1999

[8] D'Souza, Juliet, Megginson, Juliet and Nash, Robert. *Determinants of Performance Improvements in Privatized Firms: The Role of Restructuring and Corporate Governance*. Paper, University of Oklahoma, 2001

| | | with improved performance | significance of percentage |
|---|---|---|---|
| PROFITABILITY | | | |
| Return on Sales %) | 119 | 70.6 | 4.44*** |
| OUTPUT | | | |
| Normalized real sales | 113 | 70.8 | 4.42*** |
| Output/GDP (%) | 74 | 72.8 | 4.45*** |
| EFFICIENCY | | | |
| Normalized Sales Efficiency | 83 | 70.0 | 3.62*** |
| EMPLOYMENT | | | |
| Total Employment | 87 | 54.0 | 0.75 |
| INVESTMENT | | | |
| Normalized Real Capital expenditure | 85 | 65.9 | 3.09*** |
| LEVERAGE | | | |
| Debt to Assets (%) | 104 | 72.1 | 4.51*** |

Source: D'Souza, Juliet, Megginson, Juliet and Nash, Robert (2001)

*** indicates significance at 1% level, ** at 5% level and * at 10% level

### B.2. Government's Privatization Policy

From the government's point of view, the privatization policy is part of the public enterprise reform in Indonesia and must be seen in the context of preparing the Indonesian economy for the era of free trade according to global and regional trade agreements like WTO, APEC and AFTA.

The government uses two approaches to achieve SOE's efficiency and competitiveness. The first is strengthening the market orientation of SOEs by improving the control system and increasing managerial autonomy. The second is company restructuring or privatization as stated by the Director General for Public

Enterprise in the Ministry of Finance in 1997: “The two approaches to increasing SOE efficiency are designed to get the institutions right, that is to let the institutions work properly as the normal function attached, and to get the prices right, that is to let the market work with a minimal degree of distortion."[9]

The Guidelines adopted by the People’s Consultative Assembly states that the government – through the Ministry of Investment & SOEs - is to “manage State-Owned Enterprises efficiently, transparently and professionally, in particular those providing public services and other services that are not performed by the private sector”. The Guidelines further state that the government is “to improve the performance of State-Owned Enterprises” and that “SOEs that are not providing public services are encouraged to be privatized.”

The Guidelines as adopted by the Peoples Assembly call on the government to reduce the state’s direct involvement in the management and ownership of SOEs, especially SOEs that operate in competitive markets with active private sector participation.[10]

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[9] Ruru, Bacelius, *Indonesian Challenges Towards 2000 with reference to State-Owned Enterprises;* paper presented at the seminar "The Challenge of Making Indonesia Competitive - Visions and Strategies for the New Asia", Jakarta, April 1997

[10] Tjager, Nyoman I, *Indonesia’s State Owned Enterprise Reform Program*, Presentation at the joint OECD/APEC Privatization Forum, May 12, 2000, Grand Bali Beach Hotel, Sanur, Bali.

### B.3. Aspects and Real Reasons for Privatization in Indonesia

The privatization policy in Indonesia is based on several factors: financial, economic and political economy. Financially, the purpose of privatization mainly is to increase government revenue and saving, repayment of government foreign debt and to decrease government expenditure (subsidy to public sector).

Economically, the aim of privatization is to increase capitalism by controlling the main assets in several sectors of the economy and to decrease the role of public sector or increase the role of the private sector to open the opportunity for private capital in production and public service management.

Politically, by creating a market mechanism, worker unions will be more dependent on market processes or market power and finally the power of worker unions will shift to market processes

### B.4. Progress of Privatization In Indonesia

Privatization of SOEs in Indonesia consists of 2 periods.[11] The first period from 1991 to 1997 contained three main policies:

1. Selling SOEs PT Semen Gresik (cement producer), PT Indosat (international telecommunication provider), TELKOM (domestic telecommunication

[11] PPA UGM, *Penelitian Dampak Kebijaksanaan Restrukturisasi Sektor Riil*, Project Report, 1999/2000

provider), PT Tambang Timah (tin producer) PT Bank BNI (Bank) and PT Aneka Tambang (gold mine)

2. Using IPO (initial public offering) as method of privatization
3. Operational selling process done by Ministry of Finance

From 1991 to 1997, the government succeeded in privatizing (partial privatization) 6 SOEs, 5 SOEs privatize by initial public offering and one SOE privatized by direct selling method. The privatization progress from 1991 – 1997 is presented in Table 2.5

Table 2.5 Partial Privatization of State-owned enterprises, 1991-1997

| **Name of privatized company** | **Year and Method of Privatization** | **Government revenue** | **Location of Share Listing** |
|---|---|---|---|
| PT. Semen Gresik | 1991, IPO | 140 m US$ | Jakarta |
| PT. Indosat | 1994, IPO | 1010 m US$ | Jakarta, New York |
| PT. Telkom | 1995, IPO | 800 m US$ | Jakarta, New York, London |
| PT. Tambang Timah | 1995, IPO | 150 m US$ | Jakarta, London |
| PT. Aneka Gas Industri | 1995, Direct Investment | n.a. | n.a. |
| PT. BNI | 1997, IPO | n.a. | Jakarta |

Source: Ciptanet International

The second period program from 1998 to the present was indicated as "westernization", where privatization was done by selling "strategic SOEs" through private placements like Pelabuhan Indonesia II and PT Pelabuhan Indonesia III (both are port operator companies) and PT Semen Gresik. Privatization process in year 1998 – 1999 is presented in Table 2.6. In this period, the government also used the

"selling block" procedure for PT Telkom and PT Indofood. Government succeeded in selling parts of 5 SOEs, PT Semen Gresik, PT Indofood, PT Pelindo II, PT Pelindo III and PT Telkom, during this period.

From the two periods of privatization, the process in general can be categorized as successful. Even nowadays, the problem appears to PT Semen Gresik that some people are not satisfied because the price of selling to strategic partner was lower than many think the appropriate price should have been.

As for recent development in the year 2001, the government has not reached its privatization targets. First, the government set targets for privatization to achieve funds about 6,500 billion IDR. Then this target was reduced to 5,000 billion IDR. Finally, the government only succeeded to get 3,500 billion IDR as a result of privatization of two SOEs, TELKOM (continued privatization) and Sucofindo (a surveyor company).

**Table 2.6. Privatization from 1998-1999**

| **Name of privatized company** | **Method of Privatization** | **Time of Privatization** | **% of share** | **Selling value in US$** | **Selling value in IDR** |
|---|---|---|---|---|---|
| PT. Semen Gresik | Selling to strategic partner (Cemex- | October 1998 | 14% | 122.1 m | 1377.9 b |

| | | | | | |
|---|---|---|---|---|---|
| | Mexico) | | | | |
| PT. Indofood | Block Selling | January 1999 | 5.46% | 56.8 m | 500 b |
| | Block Selling | April 1999 | 4.72% | 58.2 m | 500.8 b |
| PT. Pelindo II | Selling to strategic partner (Grosbeak-Hongkong) | March 1999 | 51% | 215 m | 1892 b |
| PT. Pelindo III | Selling to strategic partner (P&O Ports-Australia) | April 1999 | 49% | 174 m | 1508.8 b |
| PT. Telkom | Block Selling | May 1999 | 9.6% | 409 m | 3277.7 b |
| Total | | | | 1035.1 m | 9057.2 b |

Source: Ministry of SOEs in the PPA-UGM(2000) and Dwijowiyoto (2001)

The government has planned to privatize more SOEs in the coming years. In the year 2002, the government plans to privatize 9 SOEs with a target 6,500 billion IDR. The cumulative target of privatization planned by the government is US$ 90,000 million (cumulative from 1999-2005). The major reason for this target is to supply government budget and to repay the government's foreign debt.

The next question is what happens to the SOE after privatization? Whether it has privatization improved SOE's performance? Increase the shareholder (government) value? To answer the questions, we will look at a key company and go through detailed analysis of the SOE's performance after privatization. We will work with a case study of one leading SOE. We select TELKOM as a key company to be analyzed because TELKOM is the leading SOE and has been privatized three times with two different methods of privatization (IPO and direct selling).

## CHAPTER III

## METHODOLOGY AND RELATED RESEARCH

### III.A. Valuation Framework

The relationship between shareholders and managers has changed over the last twenty years. Common shareholders are no longer a disjointed group of individuals who "vote with their feet" when firm performance begins to lag. The increased concentration of control over common shares by institutions and their subsequent shareholder activism have heightened managerial concern about a firm's performance, and this added pressure is not likely to go away. Institutional investors and their clients are primarily interested in performance from the perspective of the common shareholder. This means that the best way for management to avoid being the object of concern by institutional investors is to focus on shareholder returns and stock performance.[12]

The rise of institutional ownership has given a new voice to shareholder interests. The 1990s have seen shareholder concerns raised to new heights, and this phenomenon is likely to continue because every worker who is covered by a pension plan that invests in common stock has a stake in the outcome. Institutional capitalism has given rise to greater concern for share value, and value based management has become the tool of choice for trying to satisfy these concerns.

Even the new pattern of relation between shareholder and manager mentioned

[12] Martin, John D, *Value Based Management: the Corporate Response to the Shareholder Revolution*, Harvard Business School Press, 2000, pp 27

above is a fact from USA not Indonesia, we believe that increasing the ownership by foreign investor to Indonesian companies will lead the pattern of relationship of shareholder and manager to Indonesian companies soon. We consider using value based management framework of valuation for this thesis because privatization of SOEs will increase foreign ownership in Indonesia. Finally, as shareholder, foreign investors will encourage management to apply value-based management. Privatization phenomena for SOEs, make result that some SOEs now have been privatized and more institutions hold the stock of SOEs. As our concern is to look for SOEs performance after privatization and to find the value of SOEs, we will use a value-based management framework as method of this research.

### III.A.1. Measuring Performance Using Financial Ratios

In order to measure the past performance of SOEs, we will use financial statement analysis. This method will help us to identify deficiencies of the firms and then we can find possible action to improve performance. Financial statements report both a firm's position at a point in time (the balance sheet) and its operations over some past period (the income statement and statement of cash flows).

From an investor's standpoint, predicting the future is what financial statement analysis is all about, while from management's standpoint, financial

statement analysis is useful both to help anticipate future conditions and, more important, as a starting point for planning actions that will affect the future course of events. Financial ratios are designed to help one evaluate a financial statement.[13]

Five group ratios will be used in the assessment; liquidity ratios to measure liquidity, asset management ratios to measure how effectively the firm is managing its assets, debt management ratios to measure its financial leverage, profitability ratios to measure combined effects of liquidity, asset management and debt on operating results. Finally, market value ratios will be considered to compare the values established by the market with those obtained from the income statement and the balance sheet. Detail ratio and its formula are presented in Table 3.1.

The ratio analysis presented in table 3.1 will be performed by comparison with those of other firms in the same industry, that is, with industry average figures. If possible, benchmarking technique will be applied.

**Table 3.1. Financial Ratio and Formula**

| Group Ratio | Ratio | Formula |
|---|---|---|
| Liquidity Ratio | Current ratio | $\frac{\text{Current assets}}{\text{Current liabilities}}$ |
| | Quick or Acid test | $\frac{\text{Current assets} - \text{Inventories}}{}$ |

[13] Brigham, Eugene F, Louis C. Gapenski, Micahel C. Ehrhardt, *Financial Management, Theory and Practice*, Dryden Press, 1999, pp. 72

| | | |
|---|---|---|
| | | $\frac{\text{Current assets}}{\text{Current liabilities}}$ |
| Asset Management | Total assets turnover | $\frac{\text{Sales}}{\text{Total assets}}$ |
| Debt Management | Total debt to total assets | $\frac{\text{Total debt}}{\text{Total assets}}$ |
| | Times interest earned (TIE) | $\frac{\text{EBIT}}{\text{Interest charges}}$ |
| Profitability | Operating profit margin after taxes | $\frac{\text{NOPLAT}}{\text{Sales}} = \frac{\text{EBIT(1-T)}}{\text{Sales}}$ |
| | Return on Total assets | $\frac{\text{Net income available to shareholder}}{\text{Total assets}}$ |
| | Return on Common equity (ROE) | $\frac{\text{Net income available to shareholder}}{\text{Common Equity}}$ |
| Market value | Price/Earning (P/E) | $\frac{\text{Price per share}}{\text{Eraning per share}}$ |
| | Market/Book (M/B) | $\frac{\text{Market Price per share}}{\text{Book value per share}}$ |

**III.B.2. Measuring Value using Discount Cash Flow Model**

Using the framework of valuation to assess the potential value regarding the restructuring companies -- in this case is SOEs -- we will work through a typical six step valuation study. The first step is current value in stockholder perspective, the second step is business as usual value as corporate perspective, the third step is value with internal improvement, the fourth step is value with internal improvement and disposals, the fifth step is value with new growth opportunities and the sixth step is value with financial engineering.[14]

[14] *Copeland Tom, Valuation: Measuring and Managing the Value of Companies, John wiley & Sons, Inc, 2000 pp 21*

As part of valuation, we will analyze sources of potential value and find value drivers of the company that create value. Value drivers will relate to “real side” of the business.

There are many methods for valuation framework, but the most popular that will be used in this research is the enterprise discount cash flow (DCF) model. The discount cash flow model values the equity of a company as the value of a company’s operation (the enterprise value that is available to all investors) less the value of debt and other investor claims that are superior to common equity (such as preferred stock).

The values of operations and debt are equal to their respective cash flows discounted at rates that reflect the riskiness of these cash flows. The reason for choosing this method is that it will be useful to a multibusiness company as in the case of TELKOM. The formula that will be used for continuing value is:[15]

$$\text{Continuing Value} = \frac{NOPLAT_{t+1}\,(1-g/ROIC_I)}{WACC - g}$$

Where, NOPLAT= Net operating profit less adjusted taxes (in the year after the explicit forecast period)

ROIC = Incremental return on new invested capital

g = Expected perpetual growth in the company’s NOPLAT

WACC = Weighted average cost of capital

[15] *Copeland Tom, ibid, pp 136*

Since value is based on discounted free cash flow, the underlying value drivers of the business must also be the drivers of free cash flow. There are two key drivers of free cash flow and ultimately value: the rate at which the company is growing its revenues, profits, and capital base, and the return on invested capital (relative to the cost of capital).

There is other formula for the DCF method that we will use in this study. Second Formula-based DCF approaches make simplifying assumptions about a business and its cash flow stream (for example, constant revenue growth and margins) so that the entire discounted cash flow can be captured in a concise formula.

The Miller-Modigliani (MM) formula is useful for communicating the sources of a company's value. The MM formula (1963) values a company as the sum of the value of the cash flow of its assets currently in place plus the value of its growth opportunities. The formula is based on sound economic analysis, so it can be used to illustrate the factors that will affect the value of the company.[16]

The MM formula is defined as follows:

$$\text{Value of enterprise} = \text{Value of assets in place} + \text{Value of growth}$$

$$= \frac{\text{NOPLAT}}{\text{WACC}} + \text{K(NOPLAT)N} \ \frac{\text{ROIC-WACC}}{\text{WACC(1+WACC)}}$$

Where, NOPLAT = Expected level of net operating profits less adjusted taxes in the

[16] M.Miller and F.Modigliani, "*Dividend Policy, Growth, and the Valuation of Shares*", Journal of Business (September 1961), in Copeland, Tom, ibid, pp 154-155

first projected period

WACC = Weighted average cost of capital

ROIC = Expected rate of return on invested capital

K = Investment rate, the percentage of NOPLAT invested for growth in new projects

N = Expected number of years that the company will continue to invest in new projects and earn the projected ROIC, also called the interval of competitive advantage

### III.B. Results of Related Researches

#### III.B.1. Corporate Governance In The Telecommunications Industry

Research by Yeongtae Jeon in 1999 analyzed the governance structure of telecommunications companies by reviewing the existing literature and conducting case studies of telecommunication industry in different stages of privatization. This study analyzed several telecommunications companies, such as AT&T and BT – the leading telecommunication companies with diffuse ownership – and Deutsche Telekom and France Telecom – those still regulated by their respective governments.

There were three major findings of the study: First, it did not find a significant relationship between firm performance and the composition of the board. Second, in the face of rapidly deregulating environment, the telecommunication

companies have begun to give emphasis on the form of executive compensation by increasing the variable portion of the compensation. Finally, the market for corporate control is becoming an important mechanism for resolving owner manager conflicts after privatization and deregulation.

### III.B.2. Sources of Performance Improvement in Privatized Firms: A Clinical Study of The Global Telecommunications Industry

This study was done by Bernardo Bortolotti, Juliet D'Souza, Marcella Fantini and William L. Megginson and published in 2001. The study examines the financial and operating performance of 31 national telecommunication companies in 25 countries that were fully or partially privatized through public share offerings between October 1981 and November 1998.

Using conventional pre- versus post-privatization comparisons, they found that profitability, output, operating efficiency and capital investment spending increase significantly after privatization, while employment and leverage declined significantly. Summary of the performance changes following privatization of telecommunication firms is presented in table 3.2.

However, these univariate comparisons do not account for separate regulatory and ownership effects (retained government stake), and almost all telecommunication

companies were subjected to new material regulatory regimes around the time they were privatized.

They examined these separate effects using both random and fixed-effect panel data estimation techniques for a seven-year period around privatization. They verified that privatization is significantly related to higher profitability, output and efficiency, and with significant declines in leverage.

However, they also found numerous separable effects for variables measuring regulation, competition, retained government ownership and foreign listing (on U.S. and U.K. exchanges). Competition significantly reduces profitability, employment and, surprisingly, efficiency after privatization, while creation of an independent regulatory agency significantly increases output.

Retained government ownership is associated with a significant increase in leverage and a significant decrease in employment, while price regulation significantly increases profitability. Major efficiency gains result from better incentives and productivity, rather than from wholesale firing of employees and profitability increases appear to be caused by significant reductions in costs—rather than price increases.

On balance, they concluded that the financial and operating performance of telecommunications companies improves significantly after privatization, but that a

sizeable fraction of the observed improvement results from regulatory changes—alone or in combination with ownership changes—rather than from privatization alone.

**Table 3.2 Summary of Financial and operating performance changes following privatization of telecommunications firms**

| Variable | N | Fraction of Firms that increase after privatization | Z-statistic for significance of proportion change |
|---|---|---|---|
| Operating income/sales, % | 27 | 74.07 % | 2.85*** |
| Return on sales (net income/sales), % | 27 | 70.37% | 2.32** |
| ROA (net income/assets), % | 27 | 66.67% | 1.84* |
| ROE (net income/equity), % | 27 | 59.26% | 0.98 |
| Cost of goods sold/sales, % | 25 | 32.00% | -1.93* |
| Interest expense/operating income, % | 24 | 20.83% | -3.52*** |
| Interest expense/total debt, % | 24 | 45.83% | -0.41 |
| Real sales (normalized) | 25 | 92.00% | 7.74*** |
| No. of access lines in service (normalized) | 18 | 94.44% | 8.23*** |
| Real sales per employee (normalized) | 24 | 95.83% | 11.24*** |
| Average no. lines per employee (normalized) | 17 | 88.23% | 4.89*** |
| Real average salary per employee (normalized) | 15 | 93.33% | 6.73*** |
| Total number of employees | 28 | 39.28% | -1.16 |
| Normalized employment | 24 | 41.67% | -0.83 |
| Real capital expenditure (normalized) | 22 | 90.90% | 6.67*** |
| Capital expenditure/sales, % | 26 | 38.46% | -1.21 |
| Capital expenditure/total assets, % | 26 | 34.62% | -1.65* |
| Long-term debt/total assets, % | 26 | 38.46% | -1.21 |
| Total debt/total asset, % | 27 | 33.33% | -1.84* |

| | | | |
|---|---|---|---|
| Current asset/current liabilities, % | 27 | 55.55% | 0.58 |
| Cash flow from operation/total asset, % | 25 | 60.00% | 1.02 |
| Cash flow from operations/total sources, % | 23 | 39.13% | -1.07 |
| Funds from Financing/total sources, % | 23 | 52.17% | 0.21 |

Source: Bortolotti et al. (2001)

* denote significance level at 10%

** denote significance level at 5%

*** denote significance level at 1%

## CHAPTER IV

## CASE STUDY OF TELKOM

## A. Overview of TELKOM

PT (Persero) TELEKOMUNIKASI INDONESIA Tbk, henceforth we call it TELKOM, is the principal provider of telecommunications services in Indonesia, providing local and domestic long distance telephone services through 6.66 million lines in service as of December 31, 2000. TELKOM either directly or indirectly through its affiliates, provides a wide range of other telecommunications services, including mobile and fixed cellular, data communications, leased lines and certain value added services.

TELKOM, a majority state owned company, is one of the largest companies in Indonesia with total operating revenues of 9,375.7 billion IDR and 2,539.0 billion IDR of net income in the year 2000.[17] TELKOM is chosen as case study because it is suitable to represent privatized SOEs. In term of capital restructuring, government sold its share to the public for three times.

### A.1. History and Development

TELKOM was established through a series of government initiatives to develop and improve Indonesia's telecommunications infrastructure and to ensure the provision of quality telecommunications services. Telephone services were first made available in Indonesia in 1882. In 1884, the Dutch colonial Government established a

[17] TELKOM Annual Report 2001

private company to provide postal services as well as domestic and international telegraph services to the people of Indonesia. This system remained in place until 1906, when the Government formed a department to assume control of these services.

It was not until 1965 that two separate state-owned companies, PN Pos dan Giro and PN Telekomunikasi were established to handle postal and telecommunications services, respectively. In 1974, PN Telekomunikasi was further divided into Perusahaan Umum Telekomunikasi ("Perumtel") to provide domestic and international communications services and P.T. INTI, to provide telecommunications equipment manufacturing. In 1980, the international telecommunications business has transferred from Perumtel to Indosat. In 1991, the Government transformed Perumtel from a state-owned company with public service as its principal corporate purpose, into a state-owned limited liability corporation with a commercial corporate purpose, and renamed it Perusahaan Perseroan (Persero) P.T. Telekomunikasi Indonesia.

TELKOM, as we know it today, completed an initial global public offering in November 1995. On November 14, 1995, TELKOM's common stock began trading on the Jakarta and Surabaya Stock Exchanges. On the same day, American Depositary Shares ("ADSs") representing TELKOM's common stock began trading on both the New York and London Stock Exchanges.

Prior to its initial public offering in 1995, TELKOM restructured its

operations into seven Regional Divisions which currently provide telecommunications services in assigned regions, and the Network Services Division, which provides domestic long distance services through the operation of TELKOM's nationwide backbone transmission network, and several other supporting divisions.

**A.2. Business Activity**

The company’s business activities were divided into three main areas: (i) primary business, (ii) related businesses and (iii) business support or corporate overhead services. Figure 4.1 shows the company’s business activity. The company’s primary business is to provide local and domestic long distance telephone services.

Related businesses include mobile cellular services, leased lines, telex, satellite transponder leasing, Very Small Averture Terminal (VSAT) and certain value-added services. These related business are operated by TELKOM either directly or through joint venture companies in which TELKOM has a direct or indirect interest. Certain analog cellular businesses are operated by TELKOM under revenue sharing arrangements with private investors. It is the company’s intention over time to transfer additional related business to joint venture companies.

TELKOM’s revenue is still dominated by telephone revenue, which is 55.2% in 2000. Revenue generated from joint operation scheme (*Kerja Sama Operasi* or

KSO) is 24.2% and revenue from interconnection is 12%. Table 4.1 present TELKOM's revenue structures.

TELKOM had stakes in several companies operating in telecommunications related business. All the subsidiaries contributed IDR 342.9 billion to Other Income in year 2000 or 9.91% from total income before tax. Table 4.2 shows the TELKOM's income statements. The following table 4.3 set forth TELKOM's joint venture companies and TELKOM's percentage ownership in each of them.

**Table 4.1 TELKOM's Operating Revenue**

| | **1999** | | **2000** | |
|---|---|---|---|---|
| | (in billions Rp) | (in %) | (in billions Rp) | (in %) |
| Local and domestic long distance usage | 3,571 | 45.8 | 4,097 | 43.7 |
| Installation charges | 68 | 0.9 | 75 | 0.8 |
| Monthly subscription charges | 799 | 10.3 | 887 | 9.4 |
| Phone cards | -8 | -0.1 | 34 | 0.4 |
| Others | 99 | 1.3 | 84 | 0.9 |
| **Total telephone revenues** | **4,529** | **58.2** | **5,178** | **55.2** |
| **Total revenue under joint operation scheme** | **1,677** | **21.5** | **2,267** | **24.2** |
| **Interconnection revenue** | **892** | **11.4** | **1,122** | **12.0** |
| **Total other telecommunications services revenues** | **692** | **8.9** | **809** | **8.6** |
| **Total operating revenue** | **7,790** | **100.0** | **9,376** | **100.0** |

**Table 4.2 TELKOM's Income Statements**

| | **1999** | **2000** |
|---|---|---|
| **Total operating revenue** | **7,790** | **9,376** |
| Depreciation | 2,364 | 2,088 |
| Personnel | 1,106 | 1,439 |

| | | |
|---|---|---|
| Operation/Maintenance | 822 | 1,009 |
| General/Administration | 508 | 715 |
| Marketing | 47 | 87 |
| **Total operating expenses** | **4,847** | **5,338** |
| **Operating Income** | **2,943** | **4,037** |
| Interest income | 688 | 632 |
| Equity in net income of associated companies | 425 | 343 |
| Gain/Loss on foreign exchange -net | 280 | -1,064 |
| Interest expense | -1,487 | -817 |
| Others – net | 114 | 328 |
| **Other income (charges)- net** | **19** | **-579** |
| **Income Before Taxes** | **2,963** | **3,458** |
| Income Taxes | 777 | 906 |
| **Income After Taxes** | **2,186** | **2,552** |

**Figure 4.1. TELKOM Business Activity**

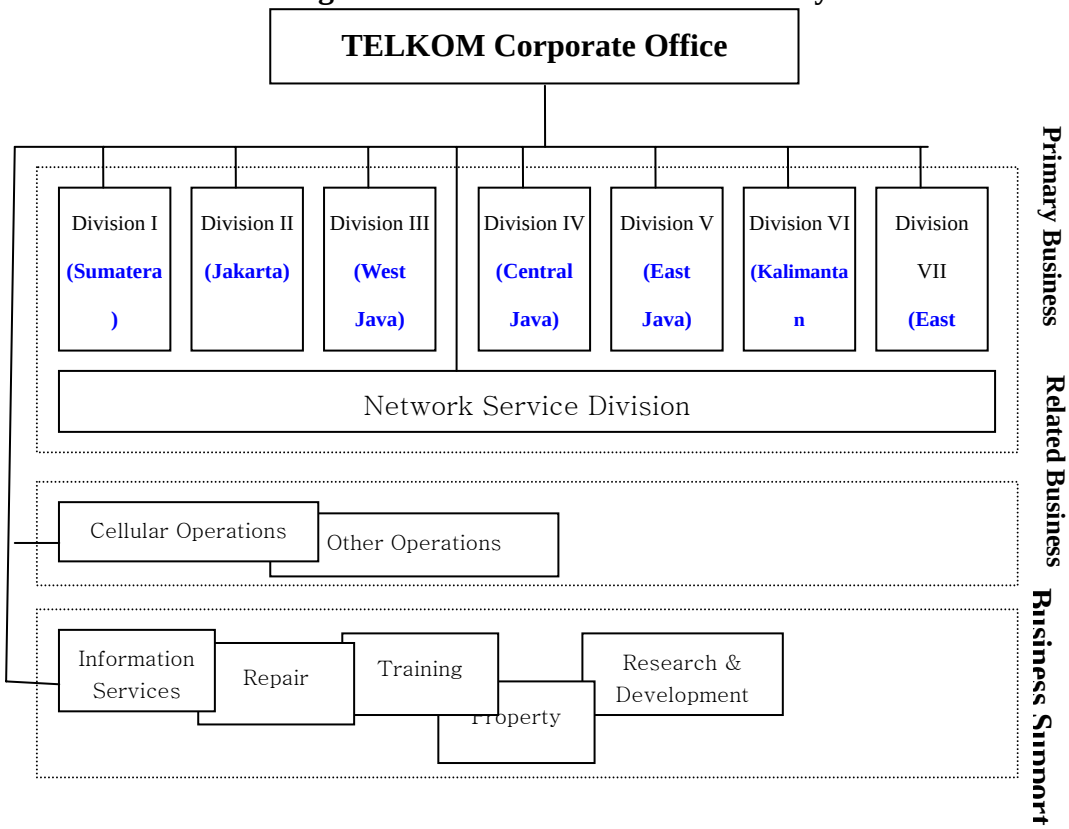



**Table 4.3 TELKOM's subsidiary**

| Company | TELKOM Ownership | Business Operations |
|---|---|---|
| Telkomsel | 77.72% | GSM cellular (national coverage) |
| Telekomindo Primabhakti | 9.00% | Holding Company: GSM cellular, revenue sharing arrangement on Telkom's fixed lines, finance, and hotel |
| Komselindo | 35.00% | AMPS cellular (regional coverage) |
| Mobisel | 25.00% | NMT-450 Cellular (regional coverage) |
| Metrosel | 20.17% | AMPS cellular (regional coverage) |
| Ratelindo | 12.86% | Fixed wireless (regional coverage – Jakarta) |
| Pasifik Satelit Nusantara | 22.57% | Satellite transponder and communication |
| Infomedia Nusantara | 51.00% | Information on telecommunication subscribers (Yellow Pages) |
| Multimedia Nusantara | 31.00% | Multimedia services |
| Indonusa Telemedia | 57.50% | Multimedia services |
| Patra Telekomunikasi Indonesia | 30.00% | VSAT for oil companies |
| Citra Sari Makmur | 25.00% | VSAT and telecommunication technology consulting |
| Batam Bintan Telekomunikasi | 5.00% | Fixed line in Batam and Bintan Islands |
| Bangtelindo | 3.18% | Construction and Consulting |
| Menara Jakarta | 20.00% | Infrastructure for multimedia services in Jakarta |
| Napsindo Primatel Internasional | 32.00% | Network Access point |
| Daya Mitra Telekomunikasi | 90.32% | TELKOM's partner in KSO VI |
| Graha Sarana Duta | 100% | Property |

**A.3. Relationship with the Government**

TELKOM has relationships with the government in five circumstances: (i) government as shareholder, (ii) government as regulator, (iii) government as customer, (iv) government as lender and (v) government as tax taker.

As shareholder, government (the state of the Republic of Indonesia) currently holds 54.29% of TELKOM's common stock and the Series A share (the "Dwiwarna Share"), which has special voting rights. Ministry of Finance is the government representative that has capacity to control shareholder of the company.

As regulator, government through the ministry of transportation regulates the telecommunications sector. Pursuant to such decrees, the ministry defines the scope of TELKOM's exclusivity, formulates and approves TELKOM's tariffs and otherwise controls many factors affecting TELKOM's competitive position, operations and financial condition. The Ministry also has authority to grant new licenses for the establishment of new joint ventures and other arrangements, particularly in the telecommunications sector.

The company and other operators are also required to pay radio frequency usage a concession fee of 1% of its collected operating revenues to the government. Concession fees amounted to Rp 42,971 million, Rp 52,028 million and Rp 50,467 million in 1998, 1999 and 2000, respectively, while radio frequency usage charges amounted to Rp 7,257 million, Rp 7,006 million and IDR 9,445 million in 1998, 1999

and 2000, respectively.

As customer, the government (several departments and agencies) purchases services from the company on a commercial basis. Government entities, in the aggregate, constitute the largest user of the company's services.

The government also has relationship with TELKOM as lender in which the government sub-loaned borrowings from foreign lenders. TELKOM obtained "two step loans" from the Government. The two-step loans are loans, which were obtained by the Government of the Republic of Indonesia from overseas banks and a consortium of contractors, which are then on-loaned to TELKOM. Percentage of two-step loan is estimated 93% from the total debt consist of loans from overseas banks (89%) and consortium of contractors (4.17%).

The loans originating from overseas banks are payable in various currencies except for IDR 4,049 billion in 2000. At the end of December 2000, of the total loan outstanding, 56.1% was in foreign currencies and the remaining 43.9% was IDR denominated. The annual interest rates charged on loans repayable in IDR ranges from 12.25% to 14.53% in 2000, on those repayable in U.S. dollar ranges from 4% to 9.26% in 2000, and on those repayable in Japanese yen range from 3.10% to 3.20% in 2000.

As tax taker, the government regulates and collects tax from TELKOM every

year. Related to investor, tax on dividends currently at the rate 20% on the amount of the distribution and the sale or transfer of common stock listed in Jakarta Stock Exchange is subject to withholding tax at a rate of 0.1% of the value of the transaction. Related with personnel expenses, consistent with the practice of most state-owned companies, TELKOM pays the income tax expense on behalf of its employees.

Thus far, government intervention was involved too far to the management decision. Some of memorandum of understanding (MoU) between TELKOM and other institution was initiated by the government. In 1998, there is MoU between TELKOM and KSO that give KSO forgiving when KSO cannot reach the target of new lines constructed. From the target of 2 million new lines for 5 KSO, only 1.2 million new lines can be constructed.[18]

The reason for that decision is because of economic difficulty, it is difficult for KSO to reach the target. In general, that MoU gives benefit to partner/KSO and loss to TELKOM. The DTR (Distribution TELKOM Revenue) was decreased from 70:30 (70 for KSO and 30 for TELKOM) became 90:10 (90 for KSO and 10 for TELKOM).

**A.4. Tariff Pricing Policy**

[18] KSO is *kerja sama operasi* or joint operation scheme, is a unique type of build, operate, and transfer arrangement consists of five KSO Divisions known as KSO Unit i.e: TELKOM's Regional Divisions I (Sumatera), III (West Java), IV (Central Java), VI (Kalimantan) and VII (Eastern Indonesia)

The new Telecom law No. 36/1999 stated that tariff structure for the operation of telecommunications network and/or telecommunications service is regulated through government regulations. Independent party (consist of telecommunication sector society) was established to assist government set up the tariff policy.

Under the Government Regulation No. 52/2000, tariff category is classified into tariff for telecommunication network provider, covering tariff for leased network and interconnection, and tariff for telecommunication service provider, which also includes retail tariff for fixed line and mobile services. Tariff structure for telecommunication network provider consists of access charge, usage charge and charge related to the universal service obligation, whereas tariff structure for retail fixed line services consists of installation charge, monthly charge, usage charge and charges related to additional facilities delivered. Tariff structure for retail mobile services consists of airtime tariff, roaming tariff and tariff for multimedia services.

New tariff structure and increasing formula for fixed line tariff based on the draft regulation by the government through the Ministry of Transportation, the new formula of increasing tariff was set based on a formula price cap with adjustment to consumer price index (CPI). The new formula that will be used in 2001 is CPI minus X and Z factor $\{\Delta P \leq CPI - (X + Z)\}$.

The X factor will be regulated by the government adjusted every year considering the condition of the economy. Basically, government will calculate the X factor based on formula: X factor=Total factor productivity of telecommunication company minus total factor productivity of Indonesian Economy.

The Z factor is calculated through the formula: Z= change in input price of Indonesia minus change in input price of the telecommunication company. Change in input price of Indonesia is measured by comparing the growth of real GDP with national growth of GDP.

In another way, percentage change of price is formulated as:

$$\Delta P=CPI-((TFP_{TELKOM}-TFP_{Indonesia})+(Input\Delta P_{Indonesia}-Input\Delta P_{TELKOM})).$$

Recently, government increased the telephone tariff in February 2002 that was announced in January is approximately 15% in average as a package of increasing tariff 45.5% until three consecutive years. The reason of increasing the tariff is to attract investor to invest in the telecommunication sector. Transport Minister Agum Gumelar who is in charge of the telecommunication sector told the press "Phone tariffs will certainly rise by end of January to... attract new investors,"[19]

The New formula for increasing tariff for cellular is:

$$P_t \leq \{ (P_0 - ICT) (1 + CPI \times Z) + ICT\}$$

where: $P_0$ = Beginning/old Tariff

[19] Reuters, January 23, 2002 in moneycentral.com

$P_t$ = Increasing tariff

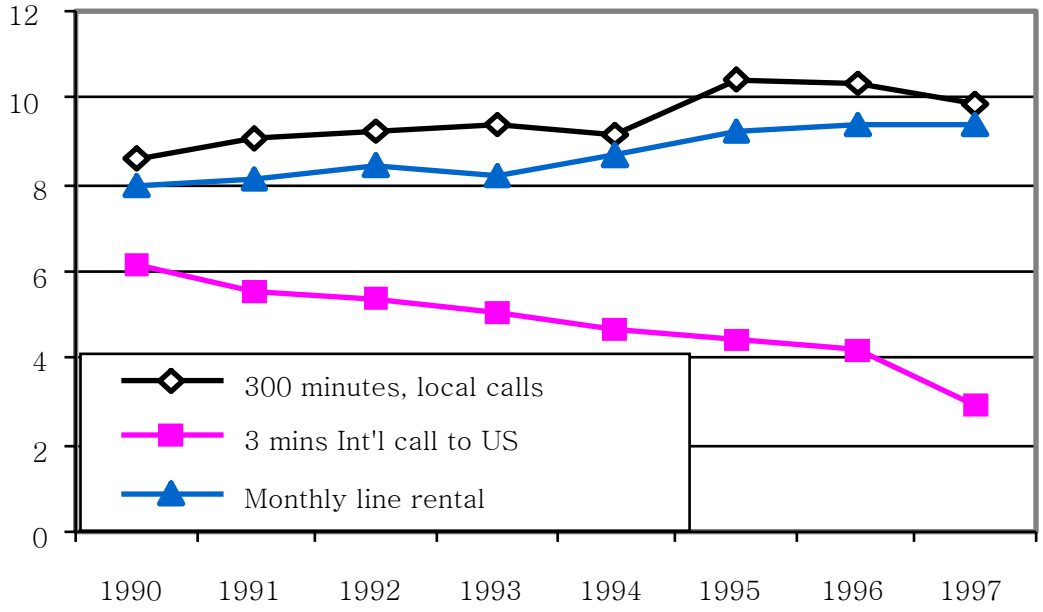
CPI = Index harga konsumen

Z = Correction factor

ICT = Interconnection tariff

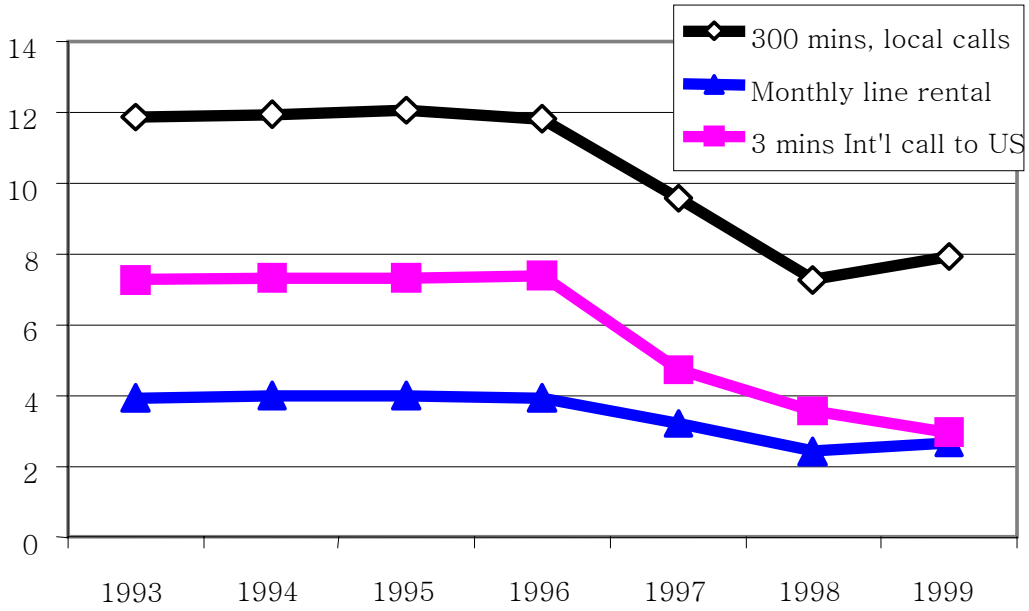
The Z factor and interconnection tariff is regulated by the government. Currently, for local calls from a mobile cellular network to the PSTN, the cellular operator is required to pay TELKOM 50% of the prevailing tariff for local pulse per minute. For local calls from the PSTN to a cellular network, TELKOM collects a per minute charge of 50% of the prevailing applicable local call tariff plus an airtime charge of IDR 325.00 per minute.

Figure 4.2 Average Trends of Tariff in 39 Major Economies in US$




Source: International Telecommunication Union (ITU)

**Figure 4.3. Trends of Telephone Tariff in Thailand (in US$)**




Source: International Telecommunication Union (ITU)

If we compare telephone tariff in Indonesia as presented in Table 4.4 with other countries presented in figure 4.2, monthly line rental tariff, local call tariff and international call tariff in Indonesia is lower than the average tariff in 39 major economies. If we compare the telephone tariff in Thailand as presented in figure 4.3, tariff of local call in Indonesia is lower than the tariff in Thailand.

**Table 4.4 Fixed Line Telephone Tariff In Indonesia 2002 (in US$)**

| | |
|---|---|
| **Monthly line rental** | |
| Industry | 4.48 |
| Residential | 2.53 |
| Social | 1.60 |
| **Local call per 300 mins** | |
| 0-20 km | 2.84 |
| >20 km | 3.79 |
| **Long distance call per 300 mins** | |
| 0-20km | 2.97 |
| 20-30km | 3.96 |
| 30-200km | 47.39 |
| 200-500km | 66.15 |
| >500km | 82.78 |
| **International call to USA 3mins** | 2.90 |

Source: TELKOM and Satelindo

Note: Exchange rate US$1=IDR10,300

**B. Restructuring of Company**

**B.1. Investment**

In order to reach the government target for TELKOM to build 2 million new lines for REPELITA VI (government 5 year development plan 1995-1999) with the constraint of the limit of budget, in October 1995, TELKOM entered into KSO (joint operating scheme) agreements with five joint venture companies to develop and manage five of TELKOM's Regional Divisions (the "KSO Divisions") for and on behalf of TELKOM. Each of these five KSO Investors consists of a consortium of Indonesian companies and at least one international telecommunications operator including France Cable et Radio SA, U.S. West International BV, Telstra Global Ltd., Nippon Telegraph and Telephone Corporation, Cable & Wireless plc and Singapore

Telecommunication International Pte. Ltd.

In 1996, TELKOM transferred responsibility for the management and operation of the KSO Divisions to the operating units managed by the KSO Investors until December 31, 2010. During these years, TELKOM continued to operate and manage the Jakarta and East Java Divisions, while separate KSO Units managed each of the Sumatera, West Java, Central Java, Kalimantan and East Indonesia regions. TELKOM received an upfront payment from KSO Investors of US $105 million in November 1995, which is being amortized over the 15 year KSO Period. TELKOM also receives two types of payment from the KSO Units: Minimum TELKOM Revenue (MTR), which is a fixed monthly payment guaranteed by the KSO Investors; and Distributable KSO Revenue (DTR) a 30% share of the net income of each KSO Unit except Division VII where the share to TELKOM is 35%.

TELKOM's unique KSO structure is designed to benefit all participants as well as the Indonesian public. The KSO Investors will benefit from the return on their investment and the people of Indonesia will receive continually improving quality and expanded services, as well as innovative new product offerings. TELKOM management continues to benefit from the strategic cooperation and technology sharing arrangements it has with each of the KSO Investors.

The diverse international telecommunications operators participating in the

KSO Investor consortia provide increased financial resources and technical expertise, fostering the continued development of each region. TELKOM believes that this structure will also allow the Company greater financial flexibility and to focus its resources on the development of the Regional Divisions (Jakarta and East Java) and the Network Services Division, which it will continue to manage and operate.

Currently, relationship between TELKOM and KSO is not good. Nowadays, TELKOM faces a problem with one KSO (Aria West International) operating in West Java Area. Under the KSO scheme, actually TELKOM cannot do more to build the network in the region of KSO regional division. TELKOM was more dependent to KSO in term of creating new lines in that region.

**B.2. Change in Corporate Culture**

TELKOM's corporate culture was mainly influenced by the role of the Chief Operating Officer (CEO). TELKOM has several times changed the CEO. During the time of CEO Willy Munandar, management system of TELKOM was still traditional and tended to be autocratic. This era was marked by a period of developing network/backbone for telecommunication.

After Cacuk Sudarijanto replaced Willy Munandar as CEO, there was a big change in the corporate culture, his reign signaled an era of innovation and dynamism.

In his time, company status was changed to become a limited liability. The company's orientation became results oriented. The salary of worker was tripled, human resource development rapidly intensified, reward and punishment was strictly enforced to fight corruption. As a result, employee's performance increases as also reflected in the company's performance.

During the era of Setyanto P Santosa, there was damp on innovation and back to basic strategy and core business. Cost effectiveness was promoted and the goal of company to become world-class telephone operator. This was also the time, the company launched its IPO.

Starting from 1997, AA Nasution became CEO, where his priority is efficiency and savings. This was the time of the crisis. Finally, during the AA Nazif era, the company tried to become Infocom Company, multi-business, implement modern management and pay attention to customer or become customer oriented.[20]

**B.3. Privatization of TELKOM**

Government divested its share of TELKOM for three times. In December 1996, government divested their share and sold 388 million of its B shares (outstanding common stock) and in May 1999, government sold its share at the

[20] Safinah, T. Hedi, Dr., MBA, (GM TELKOM Regional II Jakarta), *Customer First as Corporate Culture*, presented in the seminar held by Lembaga Managemen PPM, Jakarta 2001

amount of 898 million of its B share. On December 31, 2000, government controlled 66.19% of series B share. Lastly, in January 2002, government sold 11.9% of its share. Now, government controls approximately 54.29% share of TELKOM.

The Government is also the holder of the series A Share (*Dwiwarna*), which has special voting rights. The material rights and restrictions, which are applicable to the common stock, are also applicable to the *Dwiwarna* Share, except that the Government may not transfer the *Dwiwarna* Share and it has a veto with respect to (i) election and removal of Directors; (ii) election and removal of Commissioners; and (iii) amendments to the Articles of Association, including amendments to merge or dissolve the Company prior to the expiration of its term of existence, increase or decrease its authorized capital, and reduce its subscribed capital. Accordingly, the Government will have effective control of these matters even if it were to beneficially own less than a majority of the outstanding shares of common stock.

First privatization program to TELKOM was done by IPO. The purpose of the privatization in this period was mainly to make TELKOM efficient and more market oriented. Second privatization was done by block selling. The purpose of the selling of shares this time is mainly to get money to support the government budget. The most important issue in this period was the Indonesian economic recovery program. In terms of SOEs, the government wants to privatize SOEs to support

economic recovery program from the economic crisis.

Third privatization was done by the government to reach the privatization target in order to support the revenue of government budget. Because the government has difficulty to privatize companies under BPPN (*Badan Penyehatan Perbankan Nasional*) or IBRA (International Bank Restructuring Agency), the government then privatized TELKOM. In the government's view, TELKOM was more eligible to be divested in order to get money. Other factor why the government wants to privatize TELKOM in this period was influenced by IMF that forced the government to privatized TELKOM and Indosat (other telecommunication SOEs operating in the international calling operation).

Article 71 Letter of Intent between government of Indonesia and the IMF, January 20, 2000, government stated, "Among the larger enterprises, the two publicly listed telecommunications enterprises, TELKOM and PT Indosat, are strong candidates for further rapid privatization. Towards this end, as well as to promote private investment in the sector, we will (i) adopt a new tariff policy (by March 2000) and adopt new network interconnection rules; (ii) finalize the implementing regulations for the new Telecommunications law (by June 2000); (iii) finalize modern, new licenses for major operators, and (iv) establish an agency to provide transparent and predictable regulation. By the end of 2000, the government will also strive to

reduce TELKOM's and Indosat's extensive cross-ownership in the sector, and to secure a mutually acceptable resolution of the issues concerning the revenue-sharing contracts between TELKOM and its private partners (KSOs). This resolution will be consistent with the new Telecommunications Law, and promote competition by enabling both TELKOM and Indosat to evolve into competing full service providers."

In terms of capital restructuring, even though the second and the third period of capital restructuring was forced by another factor, especially the need for money to support government budget, investors will force management to pay attention to shareholder value and to increase the value of TELKOM as reflected by the market price. The problem is: until now, government as majority shareholder didn't pay much attention to the shareholder value issues.

## C. TELKOM's Past Performance

### C.1.Financial Analysis Ratio

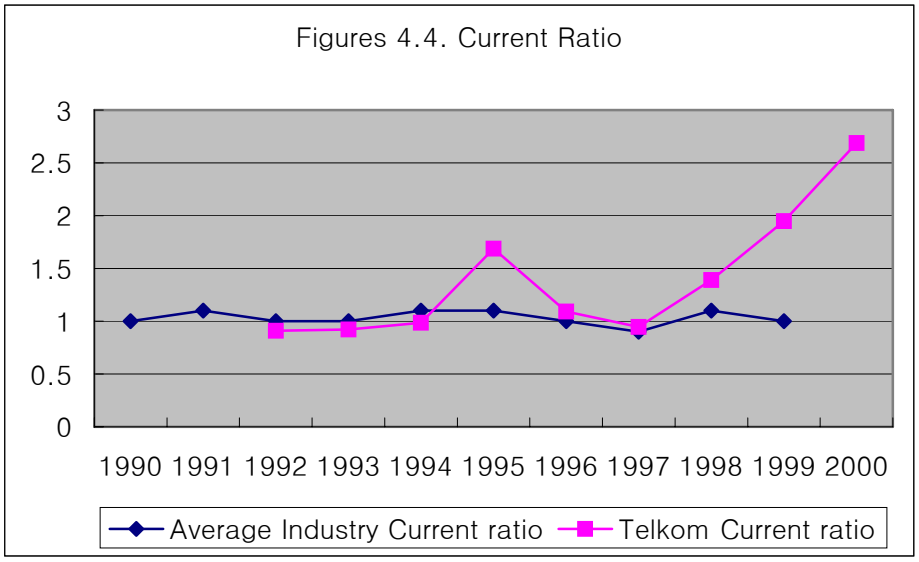
In this part, we will calculate the financial ratio of TELKOM based on data from the annual report. The method and formula for calculating financial ratio was explained in chapter III. We will analyze and evaluate the ratios in relation to the industry averages. Although industry average is not a magic number that all firms should strive to maintain, in fact some very well managed firms were above the

average while other good firms where below. However, if a firm's ratios are far removed from the averages of its industry, this is a red flag, and analysts should be concerned about why the variance occurs.[21] Data of industry average ratios come from *Almanac of Business & Industrial Financial ratios* 1999 edition; based on research conducted by Leo Troy Phd., with the sample 8,221 companies (that have net income). Summary of financial ratio of TELKOM is presented in Table 4.5.

[21] Brigham Eugene F, *Financial Management* (1999) pp 73-74

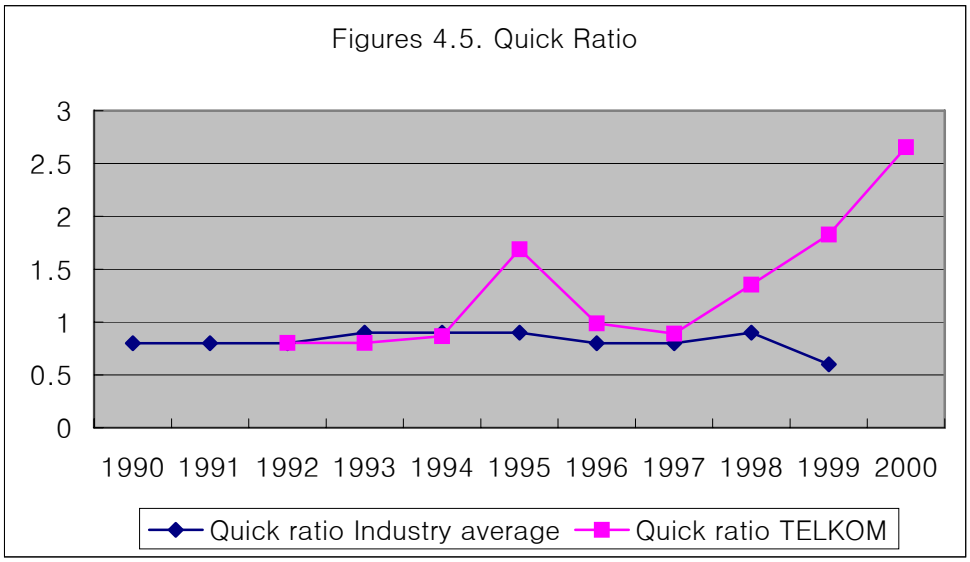
| | Unit | TELKOM RATIO | | | | | | | | | | INDUSTRY RATIO[1] |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | 1992 | 1993 | 1994 | 1995 | 1996 | 1997 | 1998 | 1999 | 2000 | average | average 5 year | Industry average[2] |
| ***Liquidity Ratio*** | | | | | | | | | | | | | |
| Current Ratio | x1 | 0.9 | 0.9 | 1.0 | 1.7 | 1.1 | 0.9 | 1.4 | 1.9 | 2.7 | 1.4 | 1.6 | 1.0 |
| Quick, Acid test | x1 | 0.8 | 0.8 | 0.9 | 1.7 | 1.0 | 0.9 | 1.4 | 1.8 | 2.7 | 1.3 | 1.5 | 0.6 |
| ***Asset Management*** | | | | | | | | | | | | | |
| Total asset turnover | x1 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.5 |
| ***Debt management*** | | | | | | | | | | | | | |
| Total debt to Total asset | % | 31.1% | 33.1% | 30.9% | 27.7% | 27.0% | 30.7% | 38.4% | 35.0% | 35.9% | 32.2% | 33.4% | 62.5% |
| Times Interest Earned (TIE) | x1 | 4.0 | 5.6 | 6.4 | 5.0 | 5.6 | 4.1 | 2.5 | 3.0 | 5.2 | 4.6 | 4.1 | 2.9 |
| ***Profitability*** | | | | | | | | | | | | | |
| Operating Profit Margin After Taxes | % | | 21.0% | 23.6% | 24.0% | 34.6% | 34.5% | 33.1% | 25.0% | 33.6% | 28.7% | 32.1% | 7.6% |
| Return on Total Assets | % | | | | | 7.6% | 4.1% | 3.9% | 9.1% | 8.6% | 6.7% | 6.7% | 9.2% |
| Return on Common equity | % | | | | | 15.3% | 8.4% | 8.8% | 19.5% | 18.2% | 14.1% | 14.1% | 10.8% |
| ***Market value*** | | | | | | | | | | | | | |
| Price/Earning (P/E) | x1 | | | | | 26.0 | 31.2 | 25.2 | 16.1 | 8.3 | 21.3 | 21.3 | 26.9[*] |
| Market/Book value (M/B) | x1 | | | | | 4.0 | 2.6 | 2.2 | 3.1 | 1.5 | 2.7 | 2.7 | |

In term of liquidity of the company, we have two ratios: current and quick ratio. TELKOM has a higher current ratio than the average for its industry. This means that TELKOM has the ability to meet short-term obligation relative to the industry average. In creditor's point of view, they like to see a high current ratio, but from the perspective of shareholder, high current ratio means the company has a lot of money tied up in non-productive assets. From figure 4.4, we can see that trend of current ratio of TELKOM has increased after the Indonesian crisis in 1997, where trend of current ratio in industry is stable around 1.




TELKOM has higher quick ratio than its industry average. This condition is similar with current ratio. The trend of quick ratio of TELKOM is also increasing especially after the Indonesian crisis in 1997, in which industry trend is a little bit stable even though it decreases around 1999. The trend of quick ratio of TELKOM and its industry average is presented in figure 4.5.

Figures 4.5. Quick Ratio




The second group of ratio is asset management ratio to measure how effective the firm is managing its assets. From the total asset turnover ratio, we can see that TELKOM's ratio is lower than the industry average, indicating that the company is not generating a sufficient volume of business, given its total asset investment. Sales should increase, some assets should be disposed of, or a combination of these steps should be taken.

The third group of ratio is debt management to look at how TELKOM is financed. Here we use two ratios: debt ratio and times interest earned ratio (TIE). TELKOM's debt ratio is 32.2% in average, which is below (around two times) from the debt ratio of its industry average. From the trend of debt ratio, we can see that TELKOM have stability of debt ratio that means the company tries to maintain its debt ratio at stable rate. Actually TELKOM can create more debt for financing, because in its industry average, telecommunication company have higher debt ratio.

The TIE ratio measures the extent to which operating income can decline before the firm is unable to meet its annual interest costs. TELKOM's TIE ratio is higher than its industry average that means TELKOM have high margin of safety. Trend of TIE ratio of TELKOM declined during the Indonesian financial crisis, but in the year 2000 TELKOM's TIE ratio rose again.

Profitability group ratios will show the combined effects of liquidity, asset management and debt on operating results. TELKOM's ratio of operating margin after tax is very high compared with its industry average. Its mean that the operating profit margin after tax of TELKOM is good, but return on total asset of TELKOM is lower than the industry average.

Return on equity of TELKOM is higher than its industry average. To measure market value ratio with Price/Earning ratio, we used data from *Provestor-Market Guide* for industry average, because there is no sufficient data from *The Almanac of Business and Industrial Financial ratios*. Trend of P/E ratio of TELKOM is decreased in five years from 25.9 to 8.3, and declined sharply in 2000. In the average, P/E ratio TELKOM is lower than its industry average.

**C.2. TELKOM's Operating Performance**

As presented in table 4.6 TELKOM's employees was reduced after

privatization but remained relatively constant. In 1995 the Company initiated a one-time, voluntary early retirement plan which expired December 31, 1995 and which was open to all employees. Under the plan, 5,188 employees accepted to take early retirement and to receive the usual lump sum cash pension benefits payable upon retirement plus a one-time incentive payment. TELKOM expects to realign its workforce by hiring more qualified personnel and thereby improve operating efficiency and employee productivity.

If we look at the efficiency-operating ratio as presented in table 4.6, sales per employees increased significantly after privatization. Other measure is line in service per employees that has increased after privatization. Both of these measures indicate that TELKOM's operating performance has increased after privatization.

The government's development policies were used to be set forth in consecutive five-year development plans known as "Repelita". TELKOM takes into account the government's targets when setting its own development plans, although it is not formally obligated to meet such targets. In 1995, government set the long-term targets for local exchange capacity per 100 inhabitants and call completion rates for *Repelita VI* as presented in table 4.7 TELKOM cannot reach the target of local exchange capacity and local exchange capacity per 100 inhabitants. The reason is because KSO as a partner of TELKOM cannot reach the target of newly installed

lines. For call completion rate target, TELKOM can surpass the target.

Recently, government changed the development-planning paradigm from set the detail target by each sector to program priorities known as “Propenas” (National Development Program) and there is no more detail long-term plan and target from government to TELKOM.

**Table 4.6 Selected operating performance ratio of TELKOM**

| | 1992 | 1993 | 1994 | 1995 | 1996 | 1997 | 1998 | 1999 | 2000 |
|---|---|---|---|---|---|---|---|---|---|
| **Total Employees** | 39,409 | 39,173 | 40,609 | 37,584 | 37,644 | 37,974 | 38,117 | 37,983 | 37,705 |
| **Sales/employees (millions IDR)** | 61.56 | 78.43 | 99.57 | 135.83 | 134.84 | 155.61 | 173.15 | 205.10 | 248.66 |
| **Line in service/ employees** | 39.30 | 47.58 | 60.65 | 87.56 | 111.20 | 131.21 | 146.17 | 160.08 | 176.70 |

**Table 4.7 Government Development Target and TELKOM Realization in 1999**

| | Unit | Government Development Target (end of 1999) | TELKOM Achievement (1999) |
|---|---|---|---|
| **Local Exchange Capacity*** | millions of lines | 10.5 | 8.4 |
| **Local Exchange Capacity per 100 inhabitants**** | x1 | 5.1 | 4.0 |
| **Call Completion Rate***** | | | |
| **Local** | % | 65 | 70.63 |
| **Domestic Long Distance** | % | 45 | 62.98 |

* Local Exchange capacity means the aggregate number of lines at a local exchange connected and available for connection to outside plant

** Referred to in the *Repelita VI* 1995-1999 (Government 5 year Development Plan 1995-1999) as line penetration

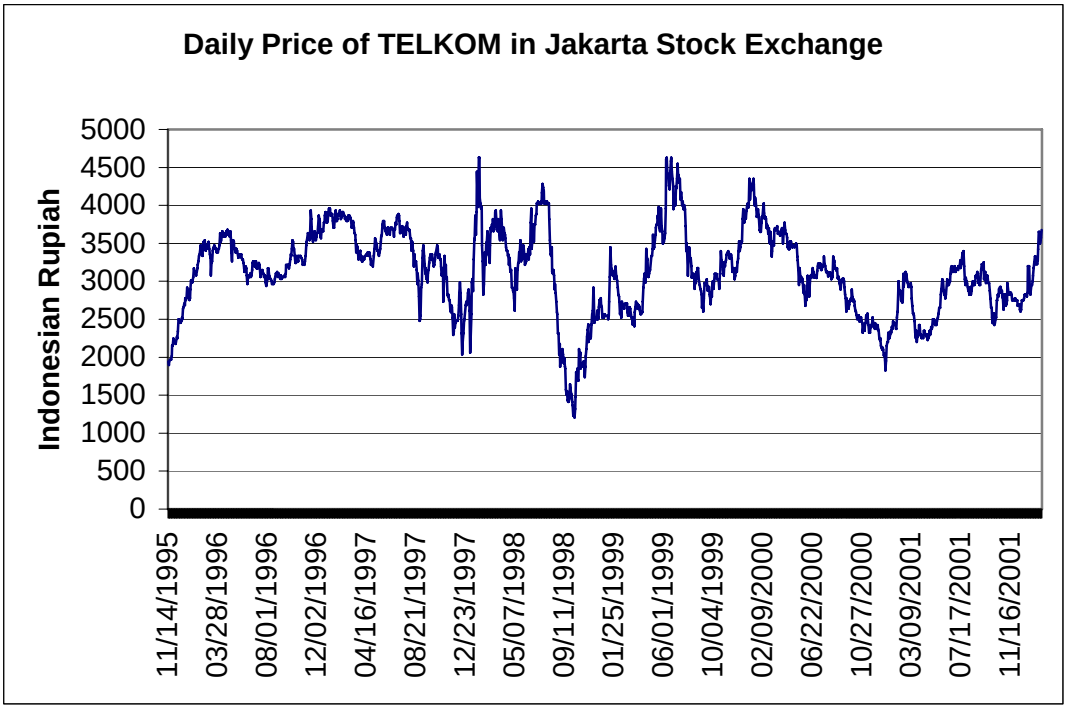
*** *Repelita* use the terminology "succesful call ratio," TELKOM has interpreted this to mean “answer to seize ratio” (ASR)

### C.3. Stock Performance

Price performance of TELKOM in Jakarta Stock Exchange (JSX) was fluctuating. TELKOM is one of the most active stocks in the Jakarta stock exchange. TELKOM's stock was traded in JSX with the price 1,944.44 IDR at the first day trading on November 14, 1995. After that, the trend of price has increase until the crisis of the Indonesian economy. During the national financial crisis, the price of TELKOM declined until 2,037 IDR in 1997 and the bottom price was in October 1998 when its price declined to 1,203 IDR. After that, TELKOM's stock price increase again in JSX. When TELKOM have a problem with Ariawest consortium (one of its partner company in KSO), TELKOM's stock price tends to decline again. The price of TELKOM in JSX is presented in figure 4.6

Relationship between TELKOM's stocks price with Jakarta Composite Index Market or well known as *Indeks Harga Saham Gabungan* (IHSG) was close to one because TELKOM is one of the most actively quoted in JSX with high capitalization and high volume (see paragraph C.4. TELKOM's Beta).

**Figure 4.6 Daily Price Performance of TELKOM in JSX**

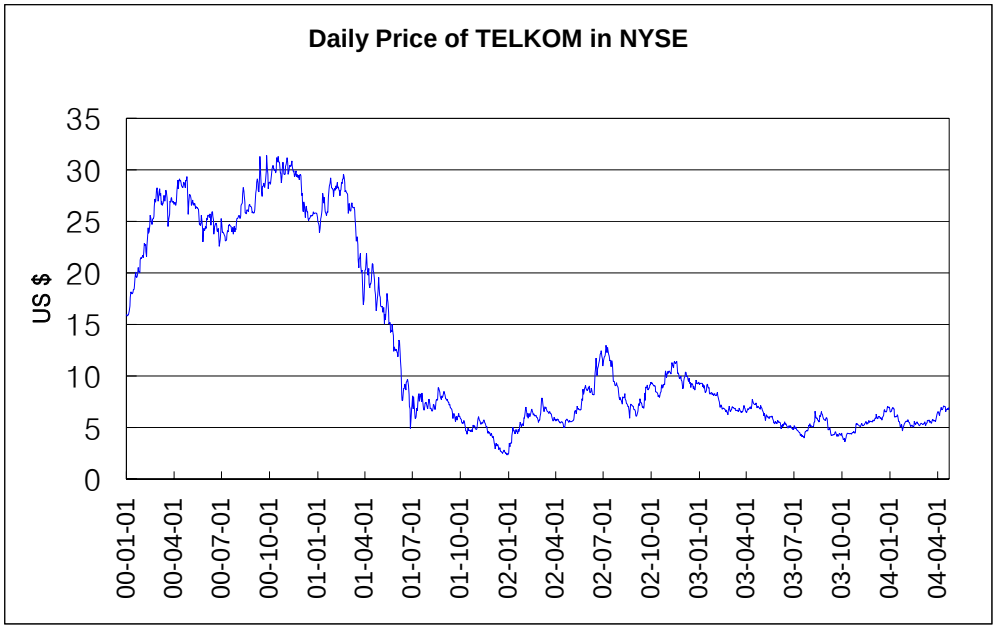



Source: Jakarta Stock Exchange

A little bit different from price performance in JSX, the price performance of TELKOM in New York Stock Exchange (NYSE) does not fluctuate but have big shock in 1997. At the first day, TELKOM's price was traded at US$ 16.01 and tends to increase until $30. At that time, people were still optimistic with Asian development growth and almost everyone look at Asia. With limited amount of share traded in NYSE, TELKOM's stock price increase regarding the high expectation from the investor to the stock of Asian companies. In 1997, as impact of financial crisis in Indonesia, TELKOM's price decline sharply until $2.5 in October 1998. Expectation from investor about the Asian miracle dropped after the Asian crisis. Now, the price of TELKOM in NYSE is traded around $5 to $6. Figure 4.7 present historical price of

TELKOM's stock in NYSE.

**Figure 4.7 Daily TELKOM's stock price in NYSE**




Source: Yahoo Finance

### C.4. TELKOM's Beta

TELKOM's beta in NYSE market is 1.9 according to several institutions like Market Guide, Standard & Poors, MSN money central etc. This Beta was measures the relationship between fluctuation of price of TELKOM and market. Beta 1.9 was measured from 5 years monthly average.

TELKOM's beta in JSX market is 1.15 calculated through simple ordinary least square (OLS) regression between TELKOM's price in JSX market as dependent variable and JSX composite market index (IHSG) as independent variable. Data range for OLS estimation is daily price from 4 November 1995 to 22 December 2000.

This thesis will use beta in JSX market because TELKOM's stock is traded more in JSX rather than in NYSE. Using JSX as parameter for TELKOM is more accurate since this research will use data of price from JSX in order to valuate TELKOM.

# CHAPTER V

# VALUATION OF TELKOM

## A. Problem of Valuation in Indonesia

Indonesia is still categorized as an emerging market. In the emerging market, valuation is more difficult because the risk and obstacles that companies face are greater than in developed markets. Technically, there are problems for emerging market like high inflation, problem in calculating risk free rate, risk premium, cost of debt and cost of equity.

Since there is no agreement on how to address these challenges among academics and industry practitioners, we will use our adjustment from basic framework of valuation using the local condition of Indonesia.

The problems of valuation in an emerging market are how to measure risk free rate, risk premium and cost of capital. For risk free rate, we don't have established instrument like Treasury bills, 10-year rate or yield of government bonds as benchmark of risk free rate. Inflation in Indonesia is higher than inflation in developed countries like USA that only 2.06% in year 2000 compared with 11.02% Indonesian inflation in year 2000. To solve this problem, usually in the past some analyst use the discount rate from the central bank. Since the government issued long-

term government bond in 1999, we prefer to use the rate of the long-term government bond with fixed rate.

**B. Reorganizing Financial Statement and Estimating Cost of Capital**

For valuation purpose, we will work in four steps; first is reorganizing financial statement, second is estimating the cost of capital, third is forecasting performance and fourth step is estimating value.

At the first step, we reorganize financial statement of TELKOM. New balance sheet is presented in table 5.1. Then we calculate invested capital as presented in table 5.2 and we calculate the net operating profit less adjusted tax (NOPLAT) as presented in table 5.3 We also calculate return on invested capital which is NOPLAT divided by invested capital. Table 5.4 shows the ROIC of TELKOM from year 1993 to year 2000.

**Table 5.1 Reorganizing Balance Sheet of TELKOM**
**Year 2000 in Billions of IDR**

| **Assets** | | **Liabilities & Equity** | |
|---|---|---|---|
| Current Asset | 9,109 | Account Payable | 1,229 |
| Long-term Asset | 19,771 | Short-term Debt & current portion of LTD | 819 |
| | | Dividend Payable | 1 |
| | | Other Current Liabilities | 1,340 |
| | | Current Liabilities | 3,390 |
| | | Long-term Debt | 9,546 |
| | | Deferred tax | 1,767 |
| | | Other long-term liabilities | 489 |
| | | Equity | 13,688 |
| **Total Asset** | **28,880** | **Total Liabilities & Equity** | **28,880** |

**Table 5.2 Invested Capital of TELKOM**
**Year 2000 in Billions of IDR**

| **Uses** | | | **Sources** |
|---|---|---|---|
| Current asset | 9,109 | Short-term debt | 819 |
| Account payable | (1,229) | Long-term debt | 9,546 |
| Dividend payable | (1) | **Total Debt** | **10,365** |
| Other current liabilities | (1,340) | Deferred tax | 1,767 |
| **Working capital** | **6,538** | Equity | 13,688 |
| Long-term asset | 19,771 | **Total Equity** | **15,455** |
| Net other long-term liabilities | (489) | | |
| **Invested Capital** | **25,820** | **Invested Capital** | **25,820** |

**Table 5.3 NOPLAT**

**Year 2000 in Billions of IDR**

| | |
|---|---|
| **Tax rate** | |
| Income tax | 906 |
| Income before tax | 3,458 |
| Tax rate | 0.26 |
| | |
| **Tax on Net operating profit** | |
| Provision for income tax | 906 |
| Tax shield on interest expense | 214 |
| Tax on NOP | 1,120 |
| | |
| **NOPLAT** | |
| Total revenue | 9,376 |
| Total expense | 5,338 |
| Net operating profit | 4,037 |
| Taxes on NOP | 1,120 |
| Change in Deferred tax | 232 |
| NOPLAT | **3,149** |

**Table 5.4 ROIC of TELKOM (1993 – 2000)**

| | **1993** | **1994** | **1995** | **1996** | **1997** | **1998** | **1999** | **2000** |
|---|---|---|---|---|---|---|---|---|
| NOPLAT | 646 | 953 | 1,228 | 1,755 | 2,039 | 2,182 | 1,949 | 3,149 |
| Invested Capital | 7,887 | 10,352 | 14,250 | 16,028 | 18,086 | 21,733 | 23,611 | 26,309 |
| ROIC | 8.2% | 9.2% | 8.6% | 10.9% | 11.3% | 10.0% | 8.3% | 12.0% |

Now we should find cost of capital of TELKOM. Interest rate of long-term debt of TELKOM varies between 3.10%-13.91% for debt from overseas bank depends on the currency. Interest rate for long-term debt from consortium varies from 3.2% - 14.53% but the proportion is less than debt from overseas banks. We assume that the cost of long-term debt is 13.91%[22]. We assume that the cost of short-term debt

[22] Annual report TELKOM 2000, pp. 66 and Note 15 pp. F-42

also equals the cost of long-term debt. This is cost before tax, and then we multiply by tax rate to get cost after tax of short-term and long-term debt. Tax rate in year 2000 is 26% as presented in Table 5.3 NOPLAT table. Formula for calculating after tax cost of debt is:

After tax cost of debt = cost of debt x (1 – tax rate)

= 13.91% x (1 – 26%)

= 10.27%

We get cost after tax for both short-term and long-term debt at 12.5% x (1-26%) equals 10.27%.

Now, we calculate the cost of equity. The method to calculate cost of equity is following the model of CAPM (Capital asset pricing model). Equation of CAPM model is: Cost of equity = risk free rate + (beta x risk premium)

= risk free rate + (beta x (market rate - risk free rate))

= 12.25% + (1.15 x (16.86%-12.25%)

= 12.25% + (1.15 x 4.61%)

= 17.55%

We get the cost of equity at 17.55% this is high compared with cost of equity in USA and compared with ROIC of TELKOM.

In emerging market, the risk free rate is not as simple to estimate as it is in developed markets. In the Indonesian case, we don't have to settle measurement for risk free rate. In the past, as commonly used, we use discount rate from central bank. Since in 1999, government issued government's bond, we prefer to use that coupon rate. The period of government bond is longer than the discount rate. Based on the coupon rate of government bond fixed rate May of 1999, serial number GBRB-FR0005FX maturity date July 15, 2007, Indonesian risk free rate is 12.25% as of year 2000. To get the risk premium for Indonesia, we use the formula market rate minus risk free rate. Finally we get that cost of equity is 17.55% that is higher than cost of debt. For market rate, we use investment rate in the domestic bank 16.86%.

Now, we look at the capital structure of TELKOM in the year 2000 as presented in Table 4.6. We assume that the book value and market value of short-term and long-term debt is equal since we don't have enough data to find out the market value of debt. For valuation purpose, we will use market value rather than book value.

Table 5.6 Capital structure of TELKOM
(in billions of IDR)

| | |
|---|---|
| **Short-term debt** | |
| Book value | 819 |
| Market value | 819 |
| % Weighted of Short-term debt | 2.64% |
| **Long-term debt** | |
| Book value | 9,546 |
| Market value | 9,546 |
| % Weighted of Long-term debt | 30.77% |
| **Equity** | |
| Book value | 15,455 |
| Amount of Share outstanding | 10,080 |
| Price of Share in JSX as 12/31/ 2000 | 2,050 |
| Market value | 20,664 |
| % Weighted of equity (market value) | 66.60% |
| **Total Capital** | |
| Book value | 24,052 |
| Market value | 31,028 |

Now, we can calculate weighted average cost of capital (WACC).

WACC = (%weighted of short term debt x after tax cost of short-term debt) +

(%weighted of long-term debt x after tax cost of long-term debt) +

(%weighted of equity x cost of equity)

WACC = (2.64% x 10.27%) + (30.77% x 10.27%) + (66.60% x 17.55%)

= 15.12%

We get WACC for TELKOM in year 2000 at 15.12%. This WACC will become a basis of valuation in the next step.

## C. Forecasting Future Performance of TELKOM

### C.1. Growth of Cellular Telephone

Growth of cellular telephone currently growing ten times faster (55% per annum) worldwide than fixed line networks (5.5% per annum).[23] In Indonesia, cellular user is growing 65.79% year-on-year as presented in table 5.7. Telkomsel, a subsidiary company of TELKOM, currently is leading the market with 2.5 million subscribers as of September 30, 2001.

Recently TELKOM developed a new cellular line based on GSM 1800 (Telkomsel is operated in GSM 900) with the name TELKOMobile that will be integrated with Telkomsel lines. The integration will make Telkomsel as operator with dual band operation (GSM 900 and GSM 1800). As other competitor operates in single band system, the dual band system will create more advantage to Telkomsel.

Market share of cellular telephone is still wide in Indonesia. As presented in Figure 5.1, cellular subscribers per 100 inhabitants in Indonesia are only 1.06 or lower than Sri Lanka, Philippines, China, Thailand and Malaysia. Cellular subscribers as percentage of total telephone subscribers in Indonesia as presented in figure 5.2 is only 26.8% lower than China and South East Asian countries.

**Table 5.7. Cellular Telephone in Indonesia**

| Cellular Operator | TELKOM's | Number of | Number of | % Growth |
|---|---|---|---|---|

[23] Tanaka, Saburo, *Pricing for an Incumbent Operator: Mobile Service*, International Telecommunication Union 2000

| | Ownership | Subscriber as of 9/30/2000 | Subscriber as of 9/30/2001 | |
|---|---|---|---|---|
| TELKOMSEL* | 77.72% | 1,449,669 | 2,562,881 | 76.79% |
| SATELINDO | None | 954,123 | 1,499,862 | 57.2% |
| EXELCOMINDO | ** | 644,860 | 1,099,660 | 70.53% |
| KOMSELINDO | 35.00% | 72,292 | 53,150 | -26.48% |
| METROSEL | 20.17% | 56,425 | 66,882 | 18.53% |
| MOBISEL | 25.00% | 13,849 | 10,905 | -21.26% |
| TELESERA | *** | 7,431 | 9,644 | 29.78% |
| **TOTAL** | | **3,198,649** | **5,302,984** | **65.79%** |

Source: TELKOM Quarterly report

* Prepaid telephone: 68.8%

** TELKOM's Ownership through PT Telekomindo Primabhakti (TELKOM's subsidiary company)

*** Revenue Sharing Arrangement with TELKOM

In terms of price, usage of 100 minutes per month mobile usage in US$ in Indonesia is only $9.74, the lowest among China, Philippines, Srilanka, Thailand, Laos P.D.R, Malaysia, Vietnam and Cambodia. The chance for tariff hike in Indonesia is still possible as we compare tariffs from other countries. Figure 5.3 shows the tariff comparison among selected Asian countries.

Figure 5.1 Mobile Subscribers per 100 inhabitants in 1999

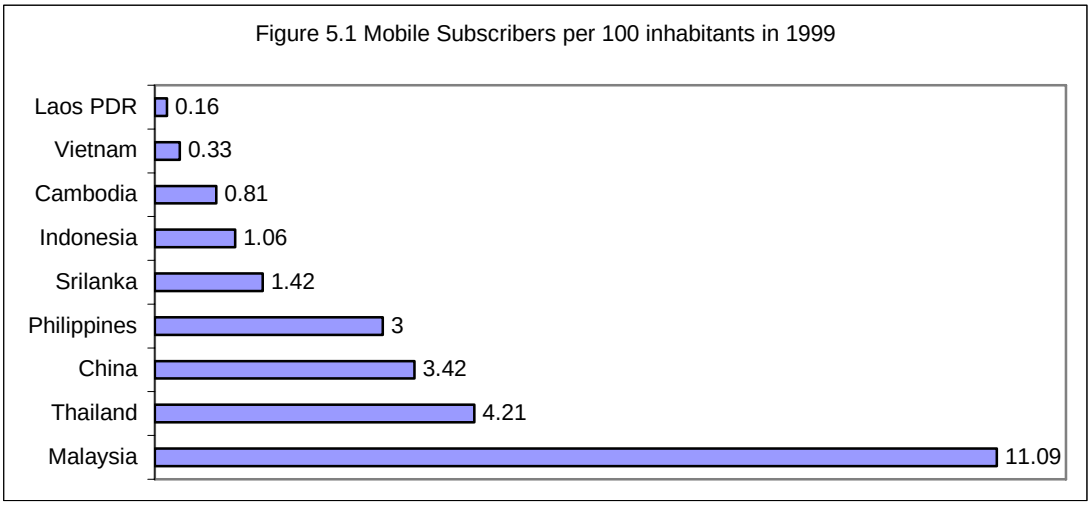


Figure 5.2 Mobile Subscribers as % of Total Telephone Subscribers (1999)

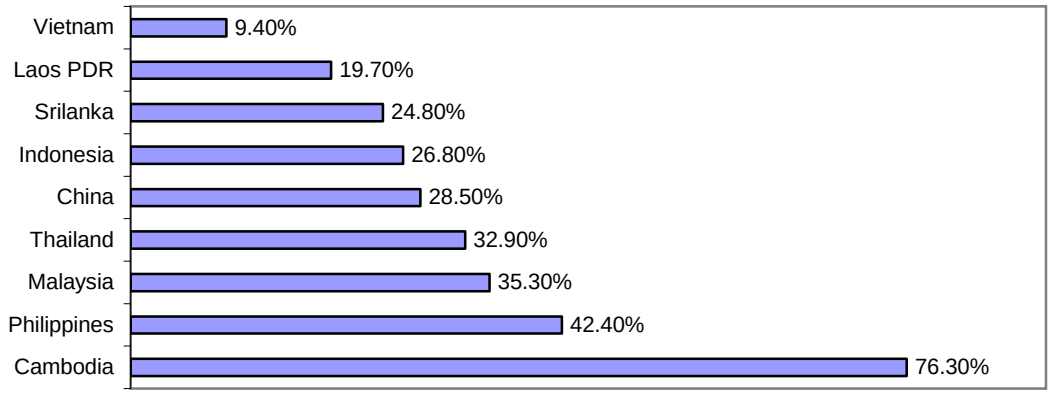
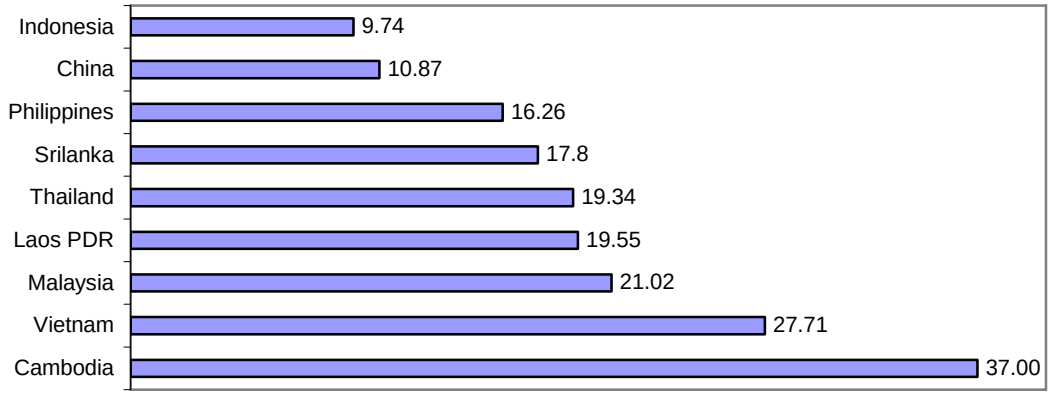



Figure 5.3 Tariff of 100 minutes per month mobile usage in $ (1999)




Source: Tanaka, 2000

## C.2. Value Driver of Future Performance

Government's decision to increase tariff of domestic call for 45.5% in the coming three years will increase the revenue of TELKOM. As presented in table 4.1 in chapter IV, contribution of total telephone revenue is 55% to the total operating revenue in year 2000. Increase in total revenue will contribute to the growth of

NOPLAT of TELKOM. Source of increasing ROIC mainly is to come from growth of NOPLAT. Growth of NOPLAT is forecasted to increase in the future.

In terms of cost of capital or WACC, Cost of equity of TELKOM in the future will tend to fall following the easing of inflation rate in Indonesia, decreasing risk free rate and decreasing risk premium.

Continuing restructuring of TELKOM is a positive sign of the future of TELKOM to increase performance. There are two plans of TELKOM in the near future:

1. TELKOM has an agreement to do “buyout” of KSO I assets and if the transaction occurs, payments shall be done in 2002.
2. TELKOM has planned to increase human resources efficiency by reducing staff/worker with early retirement program scheme in the coming years, as stated by TELKOM Executive officer to the press.

Despite the positive sign, if we look at the prospects of the telecommunication industry in Indonesia, there is room for growth. Recently government decided to drop the monopoly for TELKOM in domestic fixed line telephone business in Indonesia starting from 2002. Right now, other possible competitor is Indosat (also an SOEs that now operate as international dial service operator), but Indosat still do not have network and cable line until now. Cancellation of selling transaction of KSO IV asset

from TELKOM to Indosat will force Indosat to build new network installation.

Other treatment for TELKOM is that TELKOM is facing dispute settlement with Ariawest (partner in KSO III). Right now, this problem became a case in international arbitrage. The weakness of TELKOM is that lawyer consultant hired by Ariawest is used to be lawyer consultant of TELKOM in the past especially in the KSO agreement.

Considering some possible situation and conditions mentioned before, we would make a scenario of the future of TELKOM in three scenarios. First scenario is business as usual or modest scenario. Second scenario is high scenario that we predict TELKOM will win the competition; leading in both fixed line and mobile telephone, increase its performance and asset efficiency. Third scenario is low or worst scenario, where TELKOM cannot maintain the performance and tend to be worst, fail to solve the problem with Ariawest consortium and lose in the dispute settlement that will affect the liquidity of TELKOM.

**D. Estimating The Value of TELKOM**

Before calculating the value of TELKOM, we should assume some variable based on our forecasting of TELKOM's future performance. Based on two formula of continuing value will be used in this thesis, we should calculate some variable first.

We will calculate continuing value using first formula that is mentioned in chapter III.

$$\text{Continuing value} = \frac{\text{NOPLAT}\ (1 - g/\text{ROIC})}{\text{WACC} - g}$$

Where, NOPLAT=Net operating profit less adjusted tax (in the year after the explicit forecast period)

ROIC = Incremental return on invested capital

g = NOPLAT growth rate in perpetuity

We don't have the g number yet. According to the formula g = ROIC x Investment rate

and where, Free cash flow = NOPLAT x (1 – investment rate)

$$451 = 3149 \times (1 - IR)$$

Investment rate = 85.67%

We get the investment rate is equal 85.67%. For valuation purpose, we will estimate g based on each scenario.

**D.1. Estimating Value Using One Stage Formula**

We build some assumptions for value driver of TELKOM to estimate the value of TELKOM and set up three range of scenario. We assume that one-year

growth of NOPLAT for low scenario is 5%, 15% for modest scenario and 25% for high scenario. Based on that assumptions we estimate $NOPLAT_{t+1}$ is 3,306 billion IDR for low scenario, 3,621 billion IDR for modest scenario and 3,936 billion for high scenario.

Assumption for "g" or growth of NOPLAT on perpetuity is set in three scenarios also. Low scenario assuming that growth of NOPLAT on perpetuity of TELKOM is 8.5%. Modest scenario assumes that "g" of TELKOM is complying with calculated "g" in year 2000 about 10.3% and highest scenario assumes that "g" value is 11.5%, which is the highest among other scenario. The assumption is presented in table 5.8.

**Table 5.8 One Stage Formula valuation of TELKOM**

| | **Scenario** | | |
|---|---|---|---|
| | **Low** | **Modest** | **High** |
| ***Assumption Variables*** | | | |
| $NOPLAT_{t+1}$ | 3,306 | 3,621 | 3,936 |
| G | 8.5% | 10.3% | 11.5% |
| ROIC | 11.1% | 12.2% | 14.5% |
| *Capital structure* | | | |
| % Weighted debt | 40.0% | 35.0% | 35.0% |
| After tax cost of debt | 11.0% | 10.0% | 10.0% |

| | | | |
|---|---|---|---|
| % Weighted equity | 60.0% | 65.0% | 65.0% |
| Cost of equity | 18.5% | 16.0% | 13.9% |
| WACC | 15.5% | 13.9% | 12.5% |
| | | | |
| Continuing Value | 11,179 | 15,716 | 81,849 |
| Value of Equity | 814 | 5,351 | 71,484 |
| Value per share | 81 | 531 | 7,092 |
| %Possibility of each scenario | 20% | 40% | 40% |
| Weighted value per share | | 3,065 | |

We believe that in the future, WACC in Indonesia will decline along with the development of the Indonesian economy, declining inflation and development of the capital market. According to the estimation and planning under "National Development Program" the government of Indonesia, inflation rate targeted to decrease 3-5% in year 2004 that will automatically affect the risk free rate and risk premium. Two source of declining WACC is to come from the decline in risk free rate and the decline in risk premium.

We assume that WACC is 15% for low scenario assuming that there is no change in cost of debt (after tax) and no change in cost of equity. The modest scenario of WACC assumes that both risk free rate and risk premium are declining. We assume that the modest scenario for WACC is 14%. For the high scenario, we assume that whenever risk premium and risk free rate decline together in the sufficient amount, WACC will decline to 13% respectively.

Now we estimate the value of TELKOM using the discount cash flow (DCF)

model based on one stage formula. The formula is:

$$\text{Continuing Value} = \frac{NOPLAT_{t+1}\,(1-g/ROIC_I)}{WACC - g}$$

Using assumption of low scenario, the continuing value of TELKOM is 11,178 billion IDR based on one stage formula. The continuing value of modest scenario is 15,716 billion IDR and the continuing value of high scenario is 81,849 billion IDR, which is the highest continuing value among the other scenario.

After getting continuing value, we subtract the total debt to get the value of equity. As of December 31, 2000 TELKOM have a total debt 10,365 billion IDR. The value of equity of TELKOM is:

Value of Equity = Continuing value – Total debt

Value of equity = 11179 – 10365

= 814 IDR

To get value per share, we divided the value of equity with the total amount of share outstanding. Currently, TELKOM's share outstanding is 10,080 million.

Value per share = Value of equity / amount share outstanding

Value per share = 814 / 10.08

= 81 IDR

From low scenario, we found that per share value of TELKOM is 81 IDR. From modest scenario, we found that per share value is 531 IDR and per share value

based on high scenario is 7,092 IDR.

Using weighted measurement and the possibility of each scenario, we assume that the degree of possibility from low scenario is 20% and the possibility from both modest and high scenario is 40%. The weighted value per share of TELKOM from three scenarios is 3,065 IDR.

**D.2. Estimating Value Using Two Stage Formula**

Different from assumption in the one stage formula, assumption building in two stage formula is more influenced by the information about government policy that is in the coming three years, telephone tariff will increased by 45.5%.

We assume that “N” or interval of competitive advantage is 3 years. We assume that there is no difference in the assumption for WACC between one stage and two-stage formula. The reason of WACC assumption was explained before. The major difference assumption with one stage formula is that ROIC in the two-stage formula is higher for each scenario. We assume that in the coming three years, ROIC will increase as impact of increasing telephone tariff will be 45.5% for three years.

Assumption of ROIC for low scenario is 13.3%, contributed by increasing growth of NOPLAT to about 25%. High growth of NOPLAT will come from a rise in revenue as impact of increasing telephone tariff. Assumption of ROIC for modest scenario is 14.8% that will come from the rise in NOPLAT growth about 40%.

Assumption of ROIC for high scenario is 16.1% that is to come from high increase in NOPLAT growth about 45% and lower growth of invested capital as impact of asset efficiency.

Assumption for K or investment rate, the percentage of NOPLAT invested for growth in the new project is 85.7% for all scenarios. We are using the number of investment rate calculated in year 2000 as assumption for all scenarios.

By using the second formula, we estimate the value of TELKOM using discount cash flow model based on two stages the Miller Modigliani model. The formula is:

$$\text{Continuing Value of enterprise} = \text{Value of assets in place} + \text{Value of growth}$$

$$= \frac{NOPLAT}{WACC} + K(NOPLAT)N \frac{ROIC-WACC}{WACC(1+WACC)}$$

Using this formula, we get the continuing value based on low scenario of TELKOM is 24,381 billion IDR, continuing value from modest scenario is 32,201 billion IDR and continuing value from high scenario is 38,587 billion IDR. Using similar procedure as we have done with the one stage formula, we subtract continuing value with total debt to get the value of equity then we divide share outstanding to get the value per share.

**Table 5.9 Two Stage Formula Valuation of TELKOM**

| | **Scenario** | | |
|---|---|---|---|
| | **Low** | **Modest** | **High** |
| ***Assumption Variables*** | | | |
| *Capital structure* | | | |

| | | | |
|---|---|---|---|
| % Weighted debt | 40.0% | 35.0% | 35.0% |
| After tax cost of debt | 11.0% | 10.0% | 10.0% |
| % Weighted equity | 60.0% | 65.0% | 65.0% |
| Cost of equity | 18.5% | 16.0% | 13.9% |
| WACC | 15.5% | 13.9% | 12.5% |
| ROIC | 13.3% | 14.8% | 16.1% |
| **K** | 85.7% | 85.7% | 85.7% |
| **N** | 3 | 3 | 3 |
| | | | |
| Continuing Value | 24,381 | 32,201 | 38,587 |
| Value of Equity | 14,016 | 21,836 | 28,222 |
| Value per share | 1,390 | 2,166 | 2,800 |
| %Possibility of each scenario | 20% | 40% | 40% |
| Weighted value/share | | 2,265 | |

From low scenario assumption, we found that per share value of TELKOM is decreasing by about 660 IDR means that TELKOM management is destroying the shareholder value. By using modest scenario, per share value of TELKOM rises by 116 IDR per share. By using the high scenario assumption, TELKOM per share value increases by 750 IDR per share.

Using weighted measurement of possibility from each scenario, we assume that degree of possibility from low scenario is 20%, possibility from both modest and high scenario are 40%, the weighted value per share of TELKOM is 2,265 IDR and increasing value per share is 215 IDR per share that means TELKOM's future performance will improve creating shareholder value.

Table 5.10. Summary of TELKOM valuation (in IDR)

| | |
|---|---|
| **Continuing Value per Share** | |
| One-stage formula | 3,065 |

| | |
|---|---|
| Two-stage formula | 2,265 |
| **Price of TELKOM in JSX** | |
| Current Price (as of January 31, 2002) | 3,675 |
| Price in the year 2001 | |
| Highest Price | 3,400 |
| Lowest Price | 1,825 |
| Price in the year 2000 | |
| Highest | 4,350 |
| Lowest | 2,050 |

**Figure 5.4. TELKOM Price in JSX (year 2000 & 2001)**


The summary of the TELKOM valuation is presented in table 5.10. From table 5.10, we can see that continuing value per share is near to the highest price in the year 2000 and 2001. As we seen in the figure 5.4, in the year 2000, highest price of TELKOM is 4,350 on January 17, 2000 and the lowest price is 2,050 on December 22, 2000. In the year 2001, the highest price is 3,400 on July 23, 2001 and the lowest price is 1.825 on January 3, 2001.

From this sense, the government should consider about the timing of

privatization in order to get more benefit from price of selling. Privatizing in the high price time like in the early of 2000 will encourage high price of privatization. But privatization in the low price like in the early 2001 will create low result of privatization.

# CHAPTER VI

# SUMMARY

## A. **Conclusion**

These are the findings and results we found from this research. We divide findings in terms of **the past and the future**.

In term of the past, the major findings are:

- In the past, the government has tight relationship with TELKOM as shareholder, as regulator, as customer, as lender and as tax taker. The government also has degree of involvement in the management decision. As shareholder, the intention (what the government want and targeted as shareholder) for TELKOM was that TELKOM should develop telephone lines in all area of Indonesia
- Privatization of TELKOM is done three times. First time privatization by IPO was to strengthen TELKOM performance. Second and third time privatization, the government divested its share to get funds to support the government budget, especially because of the Indonesian financial crisis. In the government's opinion, TELKOM is a strong candidate for further rapid privatization
- TELKOM's performances after privatization improved as indicated by such financial ratio. Profitability (operating profit margin after tax) of TELKOM increased after privatization. In terms of asset management, TELKOM is still not efficient in using assets
- Economic crisis had a big impact on the sliding of TELKOM price both in NYSE and JSX. Beta of TELKOM in JSX is close to one because TELKOM

stock is one of the most traded at high volume

- There are problems of valuation in Indonesia using discount cash flow model (DCF). High inflation, no clear rate instrument for risk free rate, high cost of capital and high cost of weighted average cost of capital (WACC) will make valuation of a company more difficult. For investor, high WACC require high return on invested capital (ROIC). With WACC 15-17%, rate of return required is 18-20%. In the past, TELKOM's WACC is higher than ROIC
- In the past, TELKOM still do not pay much attention to value-based management

In term of the Future of TELKOM, the major findings and results are:

- The future performance of TELKOM will be influenced by competition. There will be no more monopoly for TELKOM for domestic call starting from mid 2002 and no more monopoly for long distance call starting from 2003.
- The growth of cellular phone market is much higher than the growth of the fixed line market. Prospect of cellular business is positive, since TELKOM acquired Telkomsel (77% share ownership by TELKOM) that will be operated in dual band (GSM 900 & 1800). Telkomsel is a leader in the cellular phone market in Indonesia

- Other positive factor for future performance of TELKOM is the government's decision to increase tariff telephone to 45.5% (2002-2004) or approximately 15% each year.
- The value driver of TELKOM is expected to be positive. ROIC will increase and (WACC) will decrease along with the development of Indonesian economy. In the future ROIC of TELKOM will surpass the WACC.
- Using Discount Cash Flow (DCF) model of valuation with one stage and two-stage formula based on three scenarios (low, modest and high), weighted result of estimation of TELKOM is estimated to have positive continuing value both in one stage or two-stage formula. This means that TELKOM increases shareholder value

**B. Suggestions and Recommendations**

Based on the findings and results of the thesis, we would like to make some suggestions and recommendations. Our suggestions and recommendations for the government are:

- We suggest that the government continue the process of privatization based on intentions to improve SOEs performance and increase government value, not only sell SOEs to get money as revenue for government budget.

- The Government should continue to make a clear and sustainable policy for the telecommunication sector. If the government wants to attract investors in the telecommunication sector, sustainable policy in investment and telephone tariff is important.
- We suggest that the government should reduce the degree of direct involvement in the SOEs management decisions and creating competition market for SOEs
- As shareholder of TELKOM, we suggest the government encourage TELKOM to increase shareholder value. We also encourage the government as shareholder of all SOEs to encourage them to increase shareholder value.

For TELKOM, our suggestions and recommendations are:

- We suggest TELKOM to apply a value based management system. Using value based management system will encourage TELKOM to improve performance and finally increase shareholder value. The other positive impact is that TELKOM's service to the public as consumer will increase.
- We suggest TELKOM continue in the restructuring process. In the investment area, we suggest TELKOM continue in the process of restructuring of subsidiary and ownership in many companies especially the disposal of non-

core subsidiaries.

- In business area, we suggest TELKOM concentrate on a strategy of future growth based on fixed lines, cellular, wireless and broadband businesses. In advance, we suggest TELKOM create a group or holding structure based on that structure.

For other SOEs in Indonesia our suggestions are:

- We suggest other SOEs to apply a value-based management system.
- In terms of restructuring, we suggest SOEs to think about what kind of restructuring they need. In the case of privatization, they should think about what kind of method of restructuring. The intention is to maximize shareholder (i.e. Government) value, not only to maximize the value of sale at that time.
- The characteristic of Indonesian SOEs is broad ownership in subsidiary that are not related on core business. We suggest SOEs to restructure ownership and subsidiary and make a group or holding company.

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