



# **Privatization: a Way in Managing Airport Service**

**Lessons from United Kingdom Experiences for  
Indonesia**

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**Double Master Degree Programme  
Institut Teknologi Bandung  
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**Privatization: a Way in Managing Airport Service  
Lessons from United Kingdom Experiences for Indonesia**

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## **Abstract**

Managing an airport through privatization is a strategy used to involve private sector in transportation infrastructure. The government, as the owner and operator of airport, is having difficulty to manage and operate the airport. The problem arises when the passenger increased and the infrastructure cannot handle it anymore. Involving private sector through privatization seen as a solution to the problem. Privatization believed can bring in funding and efficiency. This study investigates the framework of privatization which able to be implemented in Indonesia. The result should assist the government to ensure what kind of type of privatization suitable with Indonesian's condition. A literature review conducted to study the implementation of airport privatization in United Kingdom. Based on the UK's experience, a lesson obtained and combined with constraints to find appropriate way to involve private sector. The findings further indicate that Government Owned, Government Owned Company, Public Private Partnership, BOT and Management Contract are the appropriate model which can be chosen. With these strategies, the government still maintain the ownership and act in commercial way. However, it will need regulation and supporting institutions in order to apply the privatization ameliorate.

Keywords: *privatization, private sector participation, airport*

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Groningen, August 2014

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## List Contents

Abstract .....	4
Acknowledgement .....	6
List of Table.....	9
List of Figure .....	10
CHAPTER 1	
INTRODUCTION .....	12
1.1 Background.....	12
1.2 Research Objectives .....	15
1.3 Research Questions .....	15
1.4 Research Structure .....	16
1.5 Research Framework.....	17
CHAPTER 2	
THEORITICAL FRAMEWORK.....	19
2.1 Introduction .....	19
2.2 Governance .....	19
2.3 Airport .....	20
2.4 Privatization.....	26
2.5 Conceptual Model.....	33
2.6 Reflection .....	35
CHAPTER 3	
3.1 Introduction .....	37
3.2 Research Strategy.....	37
3.3 Case Study.....	37
3.4 Collecting Data .....	38
3.5 Qualitative Approaches .....	38
3.6 Reflection .....	39
CHAPTER 4	
PRIVATIZATION OF AIRPORT SERVICE IN UNITED KINGDOM.....	42
4.1 Introduction .....	42
4.2 Historical Airport Management in United Kingdom.....	42
4.3 Airport Privatization and Commercialization.....	44
4.4 Privatization Process .....	45
4.5 Analysis of Data.....	46
4.6 Lesson Learned .....	54
4.7 Reflection .....	55

CHAPTER 5	
ANALYSIS OF AIRPORT MANAGEMENT IN INDONESIA .....	57
5.1 Introduction .....	57
5.2 Historical Airport Management in Indonesia .....	57
5.3 Organization and Functionally .....	59
5.4 Constrains Facing in Development Airport in Indonesia.....	65
5.5 Options for Privatization in Indonesia .....	66
5.6 Reflection .....	72
CHAPTER 6	
CONCLUSION AND RECOMMENDATION .....	74
6.1 Introduction .....	74
6.2 Conclusion.....	74
6.3 Recommendations.....	76
6.4 Reflection .....	78
Reference:.....	80

## List of Table

Table 1.1 Indonesian Airport's Condition .....	13
Table 2.1 Classification of Airport Activities .....	22
Table 2.2 Alternative Type of Private Sector Participation .....	29
Table 2.3 Modes of Airport Privatization .....	31
Table 2.4 Type of Privatization .....	34
Table 3.1 The Linkage between research question, data needs, analysis, output and indicator .....	40
Table 4.1 Privatised Airports.....	48
Table 4.2 Part - Privatised Airports .....	49
Table 4.3 The Change of Ownership .....	50
Table 4.4 Privatization of UK's Airport .....	51
Table 4.5 Regional Airport Groups in UK.....	52
Table 4.6 Diversification Business of Local Airports.....	53
Table 5.1 Air Travel Passenger 2008-2012.....	63
Table 5.2 The number of airports by function and utilization in Indonesia.....	64
Table 5.3 Airport Category Based on Runway Length.....	65
Table 5.4 Possibility Airport Management in Indonesia.....	68

## List of Figure

Figure 1.1 Indonesian Map.....	12
Figure 1.2 Research Framework.....	17
Figure 2.1 The Governance Triangle.....	19
Figure 2.2 Airport Management in Indonesia.....	22
Figure 2.3 Economic Activities.....	24
Figure 2.4 Airport System.....	26
Figure 2.5 Five Modes of Privatisation.....	30
Figure 2.6 Focus, governance and accountability framework for airport privatisation arrangements.....	31
Figure 2.7 Key Motivates to Privatize.....	32
Figure 2.8 Conceptual Model.....	34
Figure 4.1 Ownership structures of UK airports 1967.....	43
Figure 4.2 UK's Airport Privatization and Commercialization.....	45
Figure 4.3 Ownership structures of UK airports 1997.....	47
Figure 5.1 Indonesian Airspace.....	59
Figure 5.2 Airports in Indonesia.....	61
Figure 5.3 Air Travel Passengers 2008-2012.....	63
Figure 5.4 Type of investment needs for the development of Indonesian airports for the 2010–2014 period.....	66
Figure 5.5 The Possible Model.....	69

# CHAPTER 1

## INTRODUCTION



Soekarno Hatta Airport  
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# CHAPTER 1

## INTRODUCTION

### 1.1 Background

The aviation business in Indonesia is considered very promising every year. After deregulation of the airline industry in 1999, the growth of air passengers is increasing very fast. Although hit by the rising oil prices and the global economic crisis, this growth continued to show a positive trend. There are several reasons that caused this. The first is the geographic of Indonesia in the form of islands. Therefore, it required a facility that can connect one island to another. The facility can be formed as a bridge. More precisely, an air-bridge is expected to be the fastest way in connecting the islands.

The second is the strategic position of Indonesia, which connects North to South (Japan and Australia) and West to East (Europe, Asia, and Australia). Indonesia has become one of transit points for people who travel to that destination. The third is a large population of its. With a large population, it is greater the chances someone making the trip. This large number of people is the main market being contested by the airlines. Data from Directorate General of Civil Aviation, in 2012, shows that total number of passengers carried by the scheduled domestic airlines in Indonesia, reached 72.4 million people. They are 63.6 million passengers for domestic flights, while 8.8 million passengers flew with international destinations. It raised about 15 % from the year before.



**Figure 1.1 Indonesian Map**  
(Source: rusliharahap.worldpress.com)

Dealing with this condition, airports are becoming an important part in providing service to the passengers and the aircraft. Airports must have good facilities and infrastructures in order to provide good service to customers. Facilities and infrastructures must be managed and maintained in order to give satisfaction to the users. Besides that, airports have to have skills to deal with flow dynamics of people, objects, money and authority (Salter, 2008). It requires a good management to run an airport, dealing with complex problems that faced.

Airports act as a node of air transportation system today. An airport has a very important role as one of the gates to enter a country. In addition, airports have very important role in promoting economic growth. An airport describes economic activities because the more people and goods travelled; the more money is being circulated. In the end, it will effect to economic growth of the area where the airport is taken a place.

From data above, the trend of passenger numbers increases every year. Indeed, globally, it is very good for the country's economy. Nevertheless, this phenomenon also brings another impact. What actually happens behind this phenomenon is the inability of the airport to accommodate the increasing number of passengers. The problem that occurs is the airport operates over its limit, where there is no balance between demand and supply. The infrastructure of the airport cannot handle the growth of passengers anymore. The growth of air passenger is following geometrical progression, while the development of the airport, supporting facilities and infrastructure itself is based on arithmetically. This has led to an imbalance in the implementation in the field. The following descriptions of the condition of some of the airport in Indonesia are presented in the table 1.1.

**Table 1.1 Indonesian Airport's Condition**

Airport	Actual passengers	Actual capacity	Passenger/Capacity
	Million passenger/year	Million passenger/year	%
Polonia/Kualanamu-Medan	8.0	1	800
St. Syarif Kasim II-Pekanbaru	2.8	0.7	400
RH. J Fisabilillah-Tg Pinang	0.7	0.1	700
Supadio-Pontianak	2.3	0.875	263
Soekarno Hatta-Jakarta	57.8	22	263
Depati Amir-Bangka	0.95	0.35	271
Sultan Thaha-Jambi	0.8	0.25	320
Husein Sastranegara-	1.8	0.35	514

Bandung			
St. Mahmud Badarudin II- Palembang	2.6	1	260
Ngurah Rai-Bali	12.9	8	161
Juanda-Bali	14.9	9	166
Sepinggan-Balikpapan	6.0	1.4	429
Ahamad Yani-Semarang	2.7	0.9	300
Adi Sucipto-Yogyakarta	4.5	1.1	409

(Source: Budiono, 2013)

The gap between demand and capacity is causing growing delays in aircraft operations and passenger movement. The delays will lead to cost both for the users and airport managements (Cohen and Coughlin, 2003). Besides that, if the capacity cannot overcome the demand, it certainly would be dangerous in terms of safety and security. Whereas, safety and security are number one priority in aviation world.

The rising passenger demand is the problem faced by almost all airports around the world. According to Padova (2007) the circumstance drives to airport congestion. Airports become unable to handle the need of passengers and the airlines. In solving this issue, airports need to invest in additional capacity. The government, as owner and operator of the airports, has to figure out the solution. Innovations developed for trying overcome this problem in order to improve the productivity of facilities and infrastructures.

A common response is to expand the capacity of airports. However, infrastructure projects always deal with unmanageable time and budget (Van der Heijden, 1996). The development of the airport in order to add capacity by expanding the airport takes a long time and costs a lot. Building a new airport takes time at least 20 years, from the first planning up to the first operations (Payson and Steckler, 1992). Meanwhile, the number of passenger and aircraft are still increasing.

Airport congestion is a problem that must be confronted by policy makers (Brueckner, 2002). With making the proper policy, the problem can be solved. Not only can this solve the congestion problem, but it also increases the number of passengers. With the limitations the airport had, it is very challenging how to make it more effective by implementing advanced airport planning in policy and decision making.

Almost all airports in Indonesia are owned and operated by central or local governments, including military. Developing infrastructure of airport had been a responsibility of public agencies. Fund from taxes or from public bonds can be used as capital fund to develop infrastructure of the airport. Because of budgetary constrain, this approach of funding an airport cannot held again. The government, in this case act as public agencies, has

to figure out the solution. An alternative to reduce the budgetary constrain is involving private sector in infrastructure development. Dealing with this situation, privatization is the strategies that can be chosen, in order to involve private sector in the infrastructure development.

Through some experiences from other countries could be as one of solutions not only as a comparison of knowledge but also as improving the policies regarding privatization in Indonesia. In this research, I would like try to use the experience of privatization in airport service in United Kingdom as a lesson learned for Indonesia. In the selected country, the implementations of private sector participation have been able to resolve the issue. The United Kingdom has become a benchmark in determining policy in aviation, especially in private sector participation. Also, due to the condition which is similar with Indonesian case such as a large coverage areas served and a large number of passengers travelling by plane. So, there is a new knowledge of private sector participation that could be adapted and transferred to airport management in Indonesia.

## **1.2 Research Objectives**

In developing countries like Indonesia, there are many problems that need to be solved to improve the condition of an airport. With the limited funds and time, we need to determine an appropriate policy. The research tries to elaborate the experience of private sector participation in airport service from other countries and to find out the lessons can be learned to be implemented in Indonesia. So, this research will focus on several objectives, as follows:

1. To explore the extent of privatization in managing airport from the United Kingdom experiences with Indonesia.
2. To gain better insight of involving private sector in airport management for Indonesian case by getting learned experiences from the selected country.
3. To propose the framework for managing airport based on privatization from the comparative case studies.

## **1.3 Research Questions**

To fulfil the research objectives, this research will explore sort of questions that could be as considerations to the topic. The main research question is “What are the possibilities and constraints for implementing different forms of privatization in managing Indonesian airports?”. To answer the question, the main question is divided into the following by sub questions.

1. What is defined as airport privatization?
2. What can be the form of airport privatization?
3. What lessons could be learned from the experiences in the United Kingdom in implementing different strategies in airport management?
4. What are the possible and adaptable approaches of privatization in airport management for Indonesia through the experiences in the United Kingdom cases?

#### **1.4 Research Structure**

This study will consist of six chapters. The content of this research can be described, as follow:

##### **Chapter 1: Introduction**

This chapter consists of background, research objectives, research problems, research methodology, research scope, research structure and research framework

##### **Chapter 2: Theoretical Framework**

This chapter defines about theoretical framework which is underlying this research.

##### **Chapter 3: Methodology**

This chapter describes about the research methodology used in the research. It will explain the way to collect, present, analyze the data and make the conclusion.

##### **Chapter 4: Implementation of privatization in airport management in United Kingdom**

This chapter provides the description of privatization in airport management and implementation in selected country. In this chapter also explains about lesson learned from the case study.

##### **Chapter 5: Analysis of Airport Management in Indonesian**

This chapter explains the general overview condition of airport management that has been done in Indonesia and its challenges. The possibility of lesson learned to implement into Indonesian context will be analyzed in this chapter.

##### **Chapter 6: Conclusion and Recommendation**

This chapter will propose some research findings or conclusions and recommendations.

## 1.5 Research Framework

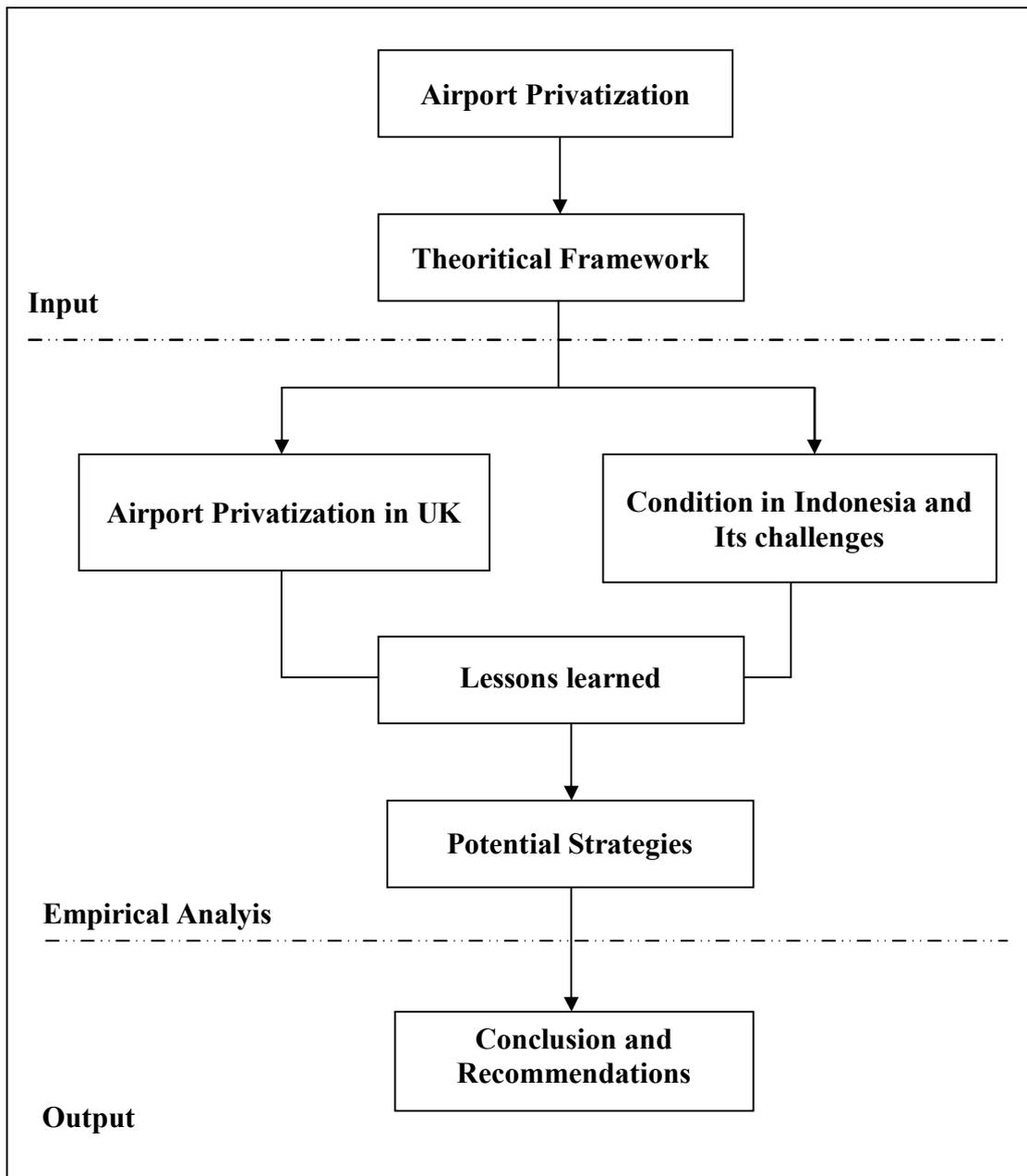


Figure 1.2 Research Framework

# CHAPTER 2

## THEORITICAL FRAMEWORK



## CHAPTER 2

### THEORITICAL FRAMEWORK

#### 2.1 Introduction

This chapter will highlight about definitions and concepts related to the main topic. There are four main parts, as follow: First, it will describe about governance. Next part defines about airport. Third, it will give a brief explanation about privatization and reflection in the last parts.

#### 2.2 Governance

The role of stakeholder in planning is changing because of the globalization and information which spreading. The government, market and civil society are the main stakeholder in planning process. The role of government has decreased. In the other side, the role of market and participation of community have increased (Kim and Dickey, 2006). A

new form of governance emerged as a consequences of the relation between the government, market and civil society.



**Figure 2.1 The Governance Triangle**  
(Source : Busscher et al, 2013)

Kim and Dickey (2006) argue that “governance” can be defined “as a process of breaking from the previous condition, where governments were centralized to promote a policy or project, to one in which a network is constructed by various actors—such as the government, state,

market, and civil society”. According to Stoker (1998), governance refers to the

emergence of “governing styles in which the boundaries between and within public and private sectors have blurred”. That can be concluded that governance is emerging when all actors become one entity.

According to Zuidema (cited in Busscher et al, 2013), explained that the shift of stakeholder role can be connected with the notions the neo-liberal and the communicative turn. In the neo-liberal turns, a shift happens from governance through coordination to governance through competition. For example, privatization increases competition in market. The government control has reduced and created new system that made self-regulating

mechanism among actors. Another shift that occurred is from governance through coordination to governance through argumentation. Participation of civil society creates a decision based on public reasoning and argumentation. The decision is taken with a collective agreement of all stakeholders.

With the shift, in other word, the role of private sector is becoming important. The government, acts as public, is starting to consider how substantial the private role in planning, especially developing transportation infrastructure. The public realized that they are facing constrain in development. They are pressed by the reality to keep taxation as low as possible (Hussain, 2010). In contrary, this tax money will be used to fund the infrastructure development. The solution to this dilemma is involving private sector. Together, by including more participation of private sector in planning, the obligation of government to maximize the welfare of society and the aim of private sector to collect maximize profit can be gained.

## **2.3 Airport**

### **2.3.1 Airport in Indonesia**

In Indonesia, airports are seen as public utility. It is the government which has the responsible in design, build, fund, operation and maintenance. The government has a full control from strategic planning to implementation. They operated and owned the airport by themselves. The government has to ensure the airport operated properly in order to give service for people and aircraft. For all this time, the authority funds the airport to develop and operate using government budget (APBN). However, public expenditure is not only on airport, but also another sector such as health, education, roads, defence and etc. These entire sectors have the same position for funding. Therefore, the government has to start finding new approach in manage the airport.

The aim of government seeking a new strategy is to gain fund for development and minimize dependence on general tax levies (Reimer and Putnam 2009). Government is incapable in financing the development of airport and tries to find new resources. Next aim's is to make a more efficient and cost effective. Organization which managing the airport faced many problems because a lot of bureaucratic that makes decision-making becomes more complex. Another aim's is to decrease political involvement in commercial and business decisions. Political can make decision-making become not accordance with the strategic plan. The last is embodying a mission-focused organization. With new strategy, a mission-focused organization can be easier to achieve.

ICAO Annex 14 (2004, p. 1-1) stated that airport or aerodrome is “*a defined area on land or water (including any buildings, installations and equipment) intended to be used either wholly or in part for the arrival, departure and surface movement of aircraft*”. According to Indonesian Aviation Act (2009, p. 4) airport is “*an area in the mainland and/or water face with certain borders being used as a site for landing and taking off of aircrafts, getting on and off of passengers, load and unloading of cargo/goods, and intra and intermodal transfers of transportation, equipped with aviation safety and security facilities, and basic and other supporting facilities*”.

An airport itself considered as a system because consists of parts that interact and support each other's. Each of these components, such as runway, taxiway, apron, terminal building and etc., has specific function. Once combined, it will produce service that is going to be used by costumers. Airports have a function more than a simple exchange for transport modes. It has more purposes that related to mobilize people and goods. According to Indonesian Aviation Act (2009, article 194), airports in Indonesia have the following roles:

- a. as a hub of transportation network in accord with its hierarchy;
- b. as an entrance of economic activities;
- c. as a place for transportation mode transfers;
- d. as a booster and supporter of industrial and/or trading activities;
- e. as an opener of isolation of regions, border regional development, and disaster management; and
- f. as an infrastructure strengthening the Archipelago Perspective and sovereignty of the country.

### **2.3.2 Airport Activities**

In general, many activities that carried out at an airport around the world. From Table 2.1, the activities can be classified into three groups. First are operational activities. These activities play an important role in the level of safety in airport operations. These activities are considered essential and become a key role in airport business. The activities such as Air Traffic Control, Meteorological Services, Telecommunication, Police and Security, Fire, Ambulance and First Aid Service, Runway, Apron and Taxiway Maintenance, are assume in operational activities.

Second is handling activities. In these activities, handling can be directed to aircraft and people. Aircraft cleaning and provision of power and fuel are associated with aircraft. Whereas dealing with people, the activities such as luggage and freight loading and unloading

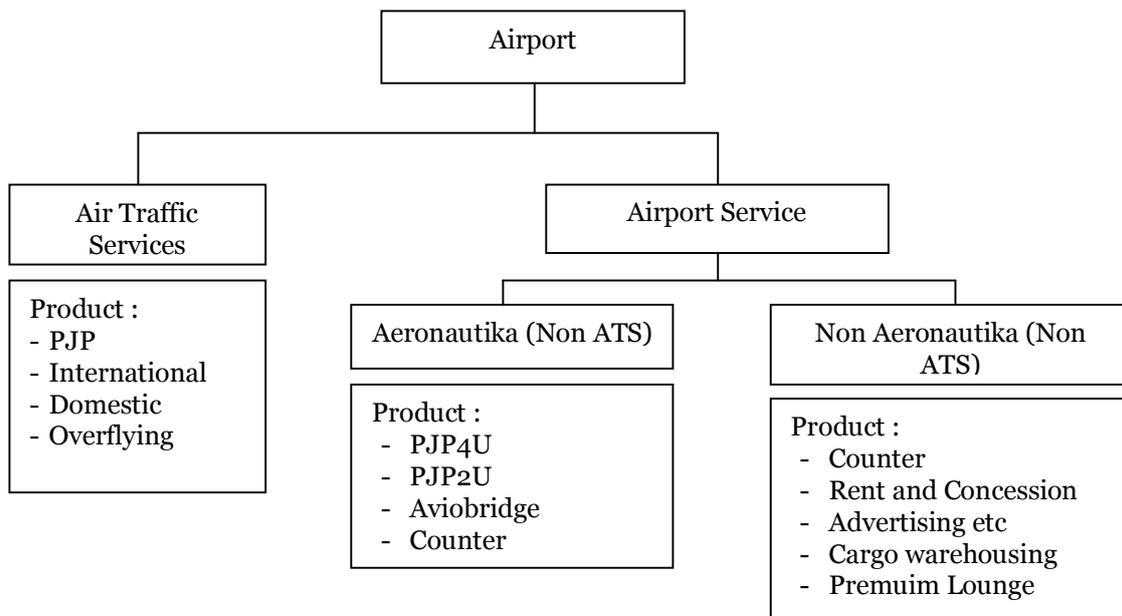
and processing of passengers, baggage and freight is performed. The last is commercial activities. The activities are done in the terminal building or surrounded the airport. The services could be in form of duty free, retailing shop, restaurant and bars, hotel, leisure service, bank and etc.

**Table 2.1 Classification of Airport Activities**

<b>Operational</b>	<b>Handling</b>	<b>Commercial</b>
Air traffic control Meteorological services Telecommunication Police and security Fire, ambulance and first aid service Runway, apron and taxiway maintenance	Aircraft cleaning Provision of power and fuel Luggage and freight loading and unloading Processing of passengers, baggage and freight	Duty free Other retailing shopping Restaurant and bars Leisure service Hotel accommodation Banks Car rental and parking Conference and communication facilities
<b>Aeronautical or airside services</b>		<b>Non aeronautical or landside services</b>

(Source: Betancor and Rendeiro, 1992)

Airport management in Indonesia is adopted the system used by the international community. There are some changes that have been made to suit with condition in Indonesia.



**Figure 2.2 Airport Management in Indonesia**  
(Source: Angkasa Pura 1, 2009)

From the figure 2.2, there are two main activities in airport management in Indonesia. First is Aeronautic Air Traffic Services (ATS). This section is concerned in navigation services consisting of domestic and in international route charges and over flying (international). Second is the airport service. It produces Aeronautic Non-ATS, including landing services products, Aircraft Placement and Storing (PJP4U), Aircraft Passenger Services (PJP2U), Ground Handling (Avio bridge), whereas the Non-Aeronautic Services include the use the counters, conveyers, utilities, rents and concessions, rents and concessions, advertising and cargo warehousing.

### **2.3.3 Economic Value**

The presence of airport creates an economic impact for a country or a region. These kinds of activities (Figure 2.2) are becoming the source of income for the airport. The users of the airports have to pay a charge for the service which they got. Route charges, landing fees, placement and storing, and ground handling are example of cost which the airline has to spend. Aircraft passenger service is the expense for the passenger for using airport facilities. Concessions from counters, rents, advertising and cargo warehousing are also providing earnings for the airport (Figure 2.3). Collected fund will be gathered by the government, as the owner of airport, and will be used for reinvest and cost recovery (Ministerial Regulation Number 6/2009).

Alongside passenger and aircraft, goods are also becoming a commodity transferred through airport. Passengers and goods are two important components which supporting the economics of region or country. The more goods and people circulated, the better the economic growth of a region. As mention before, one of roles of airport is as an entrance of economic activities (Aviation Act Number 1/2009). It means that distribution of development can achieved.

Furthermore, the existence of an airport also creates impacts for land use. The effect is caused by development of supporting infrastructure such as road and housing which attracted investor to invest. This investment will raise the price of land which will trigger the growth and development of an area near the airport.



**Figure 2.3 Economic Activities**  
(Source: Angkasa Pura, 2008)

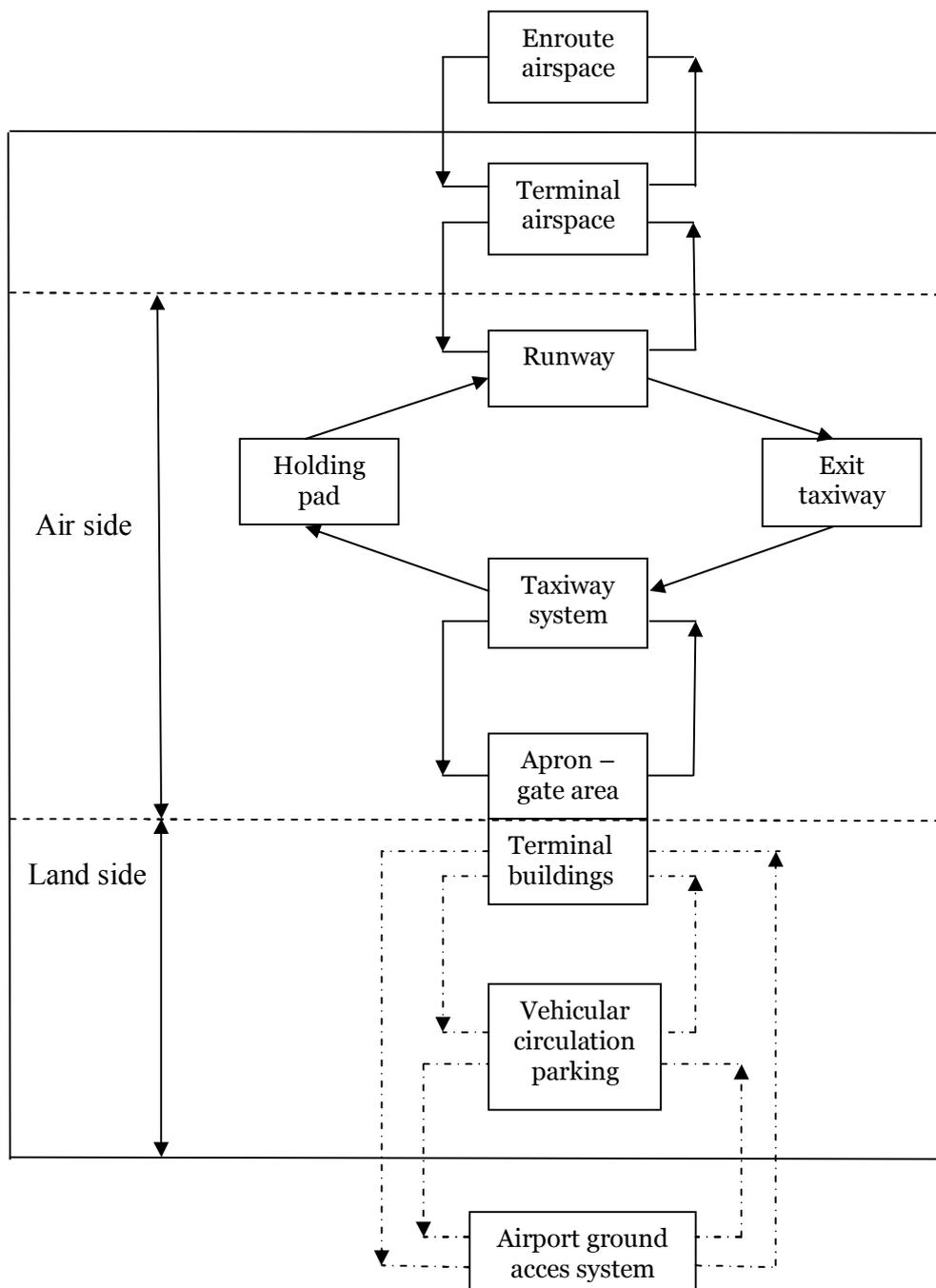
### 2.3.4 Landside and Airside

The activities held in airport can be classified into two main group services (see Table 2.1). The operational activities and handling activities are categorized in to aeronautical or airside services. The commercial activities are classified into non aeronautical or landside services. In airport system, there has been an interaction between airside and landside services. It can be said that airport is a place of meeting point among airside and landside

services. From Figure 2.4, the landside is essentially that part of the airport devoted to surface transportation. The landside services are more focus on the movement of people on the ground. It is beginning at circulation people from access system in and out the airport. The circulation areas includes roadway, parking facilities and terminal areas. In some airports, rail rapid transit lines and station are part of a larger urban mass transit system. Customarily, only roadways and transportation facilities on the airport property are considered part of the landside, even though they are actually extensions and integral with the urban and regional transportation network.

Terminal building serves as a gate to enter or to get out from the airside part. The terminal consists primarily of the buildings serving passengers and is made up of passenger loading and waiting areas, ticket counters, baggage handling facilities, restaurants, shops, car rental facilities, and the like. Loading, handling, and storage areas for air cargo and mail, often separately located, are also part of the terminal complex.

In the airside, people are already on the aircraft. In this section, the movement of aircraft is organized by Air Traffic Control (ATC). ATC is responsible for the movement of the aircraft in the airside. ATC is controlling aircraft when is going to use the runways where aircraft take off and land, the taxiways used for movement between the runway and the terminal, and the apron and gate areas where passengers embark and debark and where aircraft are parked. Another facility is imagner facilities such as enroute and terminal airspace.



**Figure 2.4 Airport System**  
 (Source: Horonjeff et al, 1975)

## 2.4 Privatization

Airport in the past usually owned and operated by local or central government. The government is in charge of in airport because airport seen as a public utility. It is the government responsibility to provide the services and the subsidies are required to run the

airport. It had been a general assumption that airport owned and operated by government was the best way to gain optimal outcomes.

Since the 1980s, there were changes happen in the way airport are owned and operated. The new trend of managing airport has rise. Corporation, commercialization and privatization become a new style in order to own and manage the airport. Private sector starts to involve in managing the airport. The entrance of new players in aviation industry emerges in since last decade. There has been massive expansion of private involvement in public infrastructure, particularly in airport. The private sector has an important role because they bring new fund, skill in operational and technical competencies, and experiences that can be very useful in managing the airport.

According Asian Development Bank (2001), there are two reasons why private sector participation become important. First, it can help to resolve the inability of public sector in gaining efficiently and cost-effectively large-scale infrastructure programs. Second, it will involve private sector to participate in all phases of the project life cycle. The purpose of this active participation is to secure better value-for-money in the project.

The involvement of private sector affected the model in managing the airport. Kapur (cited in Betancor and Rendeiro, 1992) said that there are several models of airport ownership and management. The models are (see also Oum et al., 2006; ACI – Europe, 2010):

a. Public ownership and public operations

This model has been known as a traditional model. It was use all over the world. Usually, in this model, airport owned and operated by Civil Aviation Department, under supervision Ministry of Transport. In some countries can be supervised by Ministry of Defence. Argentina is an example for an airport that supervised by Ministry of Defence.

b. Public ownership and public operations with commercial orientation

There have been changes how to operate airport in this model. In this model, public acts in commercial way in order to increase financial and to improve management. This model tries to involve a bit of private sector participation. This model is well known as public corporations. AENA-Spain, The Israeli Airports Authority and INFRAERO-Brazil are the airports which develop this model.

c. Regional ownership and operations

The aim of this model is promoting development for the airport region. The facilities of this airport is owned and operated by several local or region authorities. US and France are the example of the countries which using this model.

d. Public ownership with private operations

In this model, the ownership of the airport is still on the government. Because of budget constraint, public is hand in over the operational of airport to private sector. Public is acquired some concession from operational earning done by private. There are several options develop in this model such as joint ventures, partial/majority divestitures, management contracts, BOT (Build Operate Transfer) scheme, BOOT (Build Own Operate Transfer) scheme, LDO (Lease Develop Operate) scheme and etc. Kansai International Airport-Japan, Zurich Airport, El Dorado-Bogota, Toronto's Lester B. Pearson Airport are developed with this model.

e. Private ownership and private operations

Airport, in this model, both ownership and operation is done by private sector. There are two type develop in this model. First, fully private for profit via IPO (Initial Public Offering) with stock widely held. In this model, airport is fully privatised via the sale of all of the government shares using an IPO. This model has been used in airport which operated by the British Airports Authority (BAA). Second, fully private for profit via trade sale with share ownership tightly held. Airports sold to private interests via trade sales in which investment consortia bid to purchase airports. Australia and New Zealand are two countries that applied this model in their airports.

Gillen (2011) added another type of ownership and management in the airport. The independent not-for-profit corporations' model is used by Canada in managing their airport. They privatize their airport by making approach in self-financing, not-for-profit and non-share-capital corporate entities.

By involving private sector in managing airport, the government's role can be optimized. Government can focus more on planning, regulation and structuring. While, the private sector can be more focus on what it does best invest capital, manage the businesses, manage and create appropriate incentives for staff and management, deal with customers and improve the efficiency and quality of service (ADB, 2001).

Private sector participation in managing airport could be in a several form. ADB (2001) classified two forms of alternative models of private sector participation in airport (Table 2.2), full privatization and partial privatization. The simple view of the privatization of

governmental activity focuses on the transfer of ownership. According to ACRP's privatization guidebook (cited in Camargo 2013), "Privatization refers to the shifting of governmental functions, responsibilities, control, and in some cases ownership, in whole or in part, to the private sponsor. The term airport privatization is often understood to mean the transfer of an entire airport to private operation and/or ownership, but private sector involvement at airports can take many forms. These forms range from least to most private sector involvement".

**Table 2.2 Alternative Type of Private Sector Participation**

	Privatization	Partial Privatization		
		Concessions	Strategic Partnership	Management Contract
1. Roles				
Ownership	Private	State	State	State
Investment	Private	Private/mixed	Mixed	State
Operation	Private	Private/mixed	Private/mixed	Private/mixed
2. Regulation	Independent Regulator	Contract, ownership	Ownership	Ownership
3. Example	UK British Airport Authority plc (BAA) Regional Airport Australia Federal Airport Corporation (FAC) airports	Colombia-Bogota Philippines-Manila Cambodia-Phom Penh Argentina	Thailand South Africa	US-Indianapolis Italy-Naples Malaysia-Kuala Lumpur

(Source: ADB, 2001)

### 1. Full Privatization

Full privatization involves the transfer of ownership of airport assets from a public corporation to private investors through a flotation or through a trade sale. The first example of airport privatization occurred in UK, with the flotation of BAA plc in 1986. BAA plc took control of the seven airports previously owned by public corporation, British Airports Authority (BAA).

### 2. Partial Privatization

#### a. Concessions

Under concessions model, the private sector is in charge of some or all airport assets. There is some transfer of control to private sector for financing investment and operating the airport, usually for 25-30 years. Combination of private sector

responsibilities could be happen in many forms. In some cases, financial and all operation of airport assets is incorporated in concession agreement, in others example, the concessionaire may only be responsible for financing and operating a particular facility, such as a passenger terminal or runways, together with the public sector airport operator.

**b. Strategic Partnership**

Under the strategic partner model, a private sector firm or consortium is joining with a state owned airports operator. The collaboration is in a form of minority share holding. This partnership is becoming a tool to bring in private sector finance and operational expertise for immediately alleviate public financing constraints and improving operational activities.

**c. Management Contract**

Under the management contract model, a private sector firm or consortium is maintained to manage airport assets. Normally, private sector is managing passenger terminal facilities or retailing activities within passenger terminals. By conducting this model, private sector is able to implement their capabilities and specialties in managing airport activities, with the result of reducing costs and enhancing revenues and improving standards of services.

Moreover, Graham (2003) stated that there are five models of privatization. In these models, “the share flotation” is the most privatized method ranging to “management contract” which is the method that control of government still very strong (Figure 2.5).

<b>Privatisation mode</b>	<b>Typical attributes</b>
Share Flotation	Full or partial sale of airport through the issue and trade of share capital, but can also include long-term leasing (50+ years). This includes responsibility for airport development, operations and administration.
Trade Sale	Full or partial sale to trade partner or investing consortium, often strategically chosen for expertise rather than just available financial capital. This includes responsibility for airport development, and operations.
Concession	Mid- to short-term leasing arrangement (20-30 years) for airport operations. This includes responsibility for airport development and operation; however the influence of government is higher due to the shorter length of the lease.
Project Finance	Often manifests as a buy-operate-transfer (BOT) arrangement for a private entity to refurbish/develop and run an airport facility for a set length of time. Investment can range from the redevelopment of a single passenger terminal through to an entirely new airport. Such arrangements often range in length (up to approximately 30 years), the bigger the project the longer the operational agreement.
Management Contract	A contract for the day-to-day operations of the airport. The operating company does not have control over the development of the airport, and responsibilities may include the operation of the entire airport down to a single operational aspect such as retail or parking.

**Figure 2.5 Five Modes of Privatisation**  
(Source: Graham, 2003)

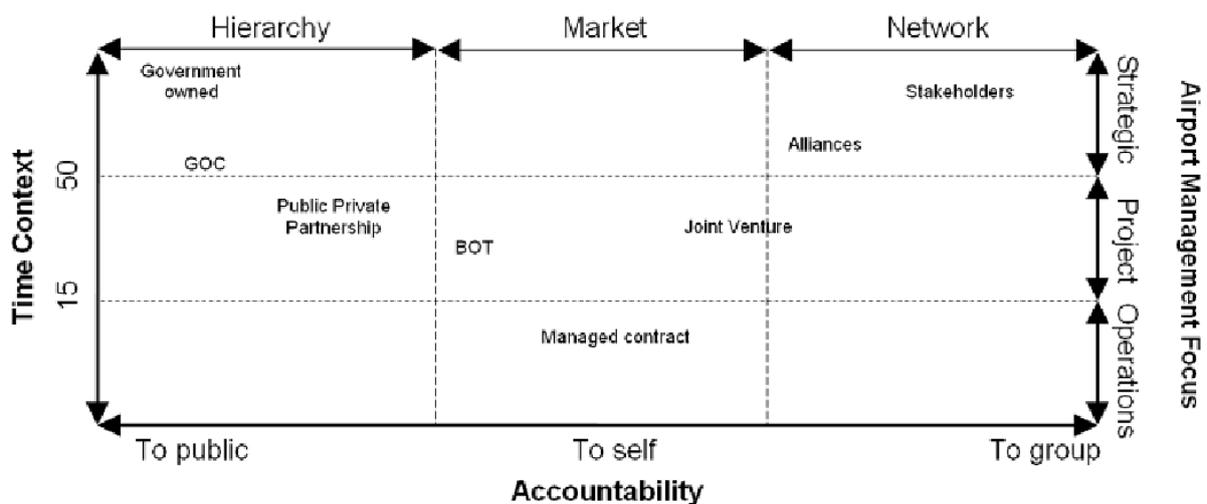
Furthermore, Donnet (2008) discussed about the possibility form of airport privatization (Table 2.3). In this model, the alternative selection of privatization is based on the level involvement of government. The mode begins from when the level of government in airport is strong. Government owned and government owned company are included in this mode. When there are combination roles between public and private, the mode which are lying from Public Private Partnership (PPP), Build-Operate Transfer (BOT), Managed Contract, Joint Ventures and Alliances. The last mode, Fully Privatised, is happen when the role of government is only making regulation.

**Table 2.3 Modes of Airport Privatization**

Privatization mode	Level of Government
Government Owned	Central to decision making
Government Owned Company (GOC)	
Public Private Partnership (PPP)	Decisions are a mixture of direct government and private sector influences
Build-Operate Transfer (BOT)	
Managed Contract	
Joint Venture	
Alliances	
Fully Privatised/Long Term-Leasing (Stakeholders)	Decisions are bound by regulated limits

(Source: Donnet et al., 2008)

Subsequently, by combining modes of privatization above with ideas of managerial focus with the implications of ownership on accountability and governance, a framework has been developed (Figure 2.6).



**Figure 2.6 Focus, governance and accountability framework for airport privatisation arrangements**

(Source: Donnet et al., 2008)

From the framework, the outcomes from privatization can be matched with expectation and accountability. This scheme can be very useful for the government and privatized airport for development. Government can apply this method to ascertain good governance and privatization according to what they are want to achieve. For the private airport, this framework can be very useful to recognize suitable contractual and/or partnership for airport development and operational.

According to Ernico (2012), the potential benefits of airport privatization have been identified as follows (Figure 2.7):

1. *“To include access private capital for development*
2. *Extract an upfront or ongoing payment for the airport asset (monetize the asset)*
3. *Stimulate air service and airline competition*
4. *Introduce more innovation and creativity, including entrepreneurial ideas in the development of nonairline revenue*
5. *Secure long-term efficiencies in operation and maintenance and enhance customer service,*
6. *Shift the risk of debt, capital development, and/or operations to the private sector*
7. *Accelerate project delivery and reduce construction costs*
8. *Reduce reliance on general tax levies*
9. *De-politicize airport decision making”.*



**Figure 2.7 Key Motivates to Privatize**  
(Source: Ernico, 2012)

Beside that, Truitt and Esler (1996) also stated that there are two basic claims behind privatization. Privatization believed will improve efficiency in airports operation, and private investors seen as an alternative source of funding for expansion of existing airports or

building new airports. Nevertheless, many kinds of activities conducted in airport are involving a substantial public interest. The activities in practice cannot be assigned totally to private sectors, which have two characteristics. It is dealing with community's welfare and can potentially create monopolistic in the public. It is commonly accepted that the operation and management of facilities with these features cannot be totally left to private commercial operators (De Neufville, 1999). For several countries, airport and air navigation are still seen as a public interest. Those two activities are representing the sovereignty of the country.

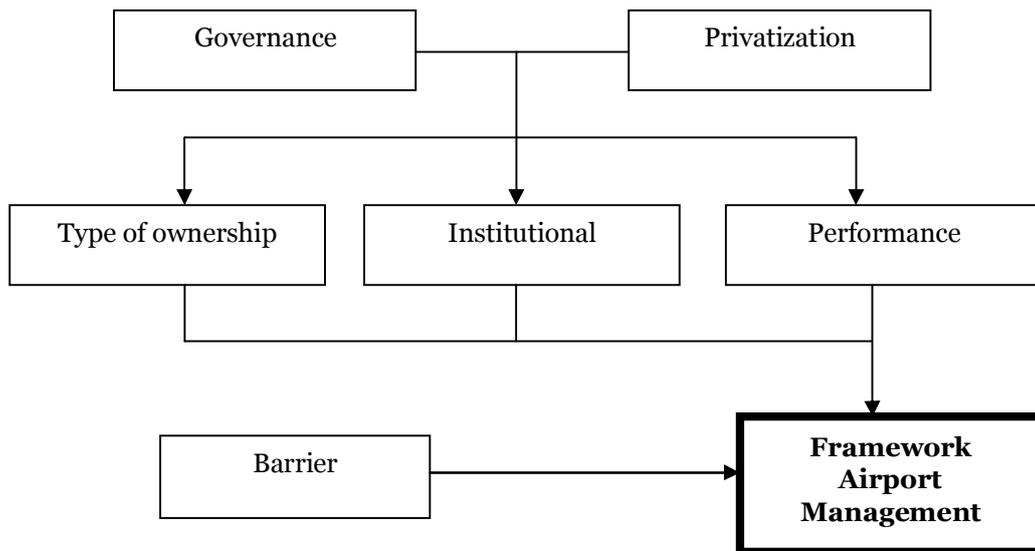
## **2.5 Conceptual Model**

From the theoretical theory above, governance emerges as a result of external and internal condition. The globalization and spreading information are the key point of external factors. The one country's experience could become a lesson learned for another country. They want to try implementing it for better condition. In contrary, internal factor is represented by constrain faced by one of the actors in planning. The government, market and civil society are the three main actors. The government inability in producing services to public makes participation of private sector become important. However, participation of private sector also confronted with regulations and laws which become the barrier.

The two factors will be very useful to determine the shape of private sector participation in the country. It will explain how far the involvement of private sector. The country which facing the problem in giving service to public could be implemented a lesson learned from another country. Nevertheless, not all lesson learned can be applied. It must be adapted with the prevailing conditions in the country. It should be able to accommodate with regulations and laws and also overcome with existing hindrance.

Private sector participation is also encounter in transportation infrastructure, especially in airport. Private sector participation, in a form of privatization, is seen as a common solution in cover up the failure of government. Revolution in airport management is happening from full government control to private sector control. In return of funding and efficiency, government is willing to lose their control in airport.

In order to answer the research question, this research elaborated several theories and a conceptual model was created (Figure 2.8). The model is used to achieve the aim of this research, a framework in managing airport in Indonesia.



**Figure 2.8 Conceptual Model**

This model was created based on the condition that governance emerging as result of external and internal factors. Governance makes more involvement of private sector. This movement is supported with privatization movement which happen in the worlds. To support the conceptual model, an analytical framework was prepared. The framework is going to be used to analyze the case study which selected. The framework will describe the criteria that are used to analyze and make an assessment from the findings. The criteria were chosen because they can deem to generalize the condition which happens. The criteria which used are:

1. Type of privatization/ownership

This factor will highlight about type of governance/ownership that used in the case study. This research tries to explain the type of privatization which is used in the selected country. To facilitate assessment, this research will use the framework developed by De Neufville, R. (1999).

**Table 2.4 Type of Privatization**

		Ownership	
		Government	Private
<b>Management and Strategic Direction</b>	<b>Government</b>	Fully Government: Complete Control by Civil Service and Politics	Regulated Control: Unilateral, centralized control by Government of rates and access
	<b>Private</b>	Shared Government policy as owner, Control: sets as owner,	Fully Private: Complete Control by Private Interests

		private implement	parties	
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(Source: Neufville, 1999)

## 2. Institutional

This part will describe about the legal and regulatory aspect. It will refer to rules that established for supporting privatization.

## 3. Performance

This part will explain and elaborate about financial, commercial and economic aspect. This research will further describe about possibility of potential revenue which gained.

To achieve a good model of airport management, it should also pay attention to the obstacles that may arise. This hindrance will also help in forming the appropriate model.

## 2.6 Reflection

The theory explained above will be used to answer the objectives of this research. This theory will become guidelines and basic grounding in order to complete this study. Without the theory, the author cannot make assessment about the research. In the author point of view, the theories used above are enough to construct the answer to research questions. The theories will give brief overview about the issue addressed. However, to get more explanations about the problem discussed, more theories are needed. There are still many problems that cannot be covered if we want to discuss in more detail.

# CHAPTER 3 METHODOLOGY



## **CHAPTER 3**

### **METHODOLOGY**

#### **3.1 Introduction**

This chapter explores the method used in this research in order to answer the research question. The first part, it will describe about research strategy. Second, case study will be explained to support qualitative research. The next part is what kind of source used to collect the data. Fourth, it will give a picture about method of analysis used in qualitative research and the last part is about reflection of methodology.

#### **3.2 Research Strategy**

There are two strategies used in social research method, quantitative and qualitative approach. For this research, it was developed in descriptive qualitative research. The study is trying to extend and/or explain deeper about how things happen in the social world. This research cannot be formulated in quantitative way because this research stresses on words rather than calculation in the collection and analysis of data (Bryman, 2012). Although using several statistic calculations, it is used only as supporting data. Moreover, Hancock et al. (1998) explained that qualitative research is focused on developing explanations of social phenomena. It will reveal the facts, conditions and phenomena occurred.

Bryman (2012) explained that seeing through the eyes of the people being studied, description and the emphasis on context, emphasis on process and flexibility and limited structure are the main preoccupations of qualitative research. However, he also stated several critiques rise on qualitative research such as the research is too subjective, difficult to replicate, problems of generalization and lack of transparency.

Based on the main research question, “What are the possibilities and constraints for implementing different forms of privatization in managing Indonesian airports?”, this research attempts to describe and understand the reality of airport privatization. To implement it, the research needs to take into account constraints and complexity faced by Indonesian government.

#### **3.3 Case Study**

Case study is of the methods used in to perform qualitative research. According to Yin (cited in Eisenhardt 1989) stated that case study as research strategies which explained about

duplication logic that suit to multiple case analysis. Moreover, Gerring (2004) explained that “*case study is an intensive study of a single unit for the purpose of understanding a larger class of (similar) units*”. Case study is one of the methods can be used to collect, present and analyze the data. From case study, a lesson learned could be drawn and applied to another case.

The research will be focused on the airport privatization that has been done in the United Kingdom. United Kingdom selected because it was the first country in the world that carried out privatization in transportation infrastructure especially in airport. Based on the United Kingdom’s experience, many countries make it as an example in privatizing airport. United Kingdom is also known as one of the leading countries in aviation business with handling more than 228 million passengers in 2013 (UK CAA, 2014). They succeed implementing privatization in airport with different kind form of privatization. From the United Kingdom case, not only success story can be learned but also failure story. Another reasons explained this research only use UK as a case study is almost all countries in the world using UK as their benchmark when they privatize their airport.

### **3.4 Collecting Data**

This research will use literature review and document review in collecting data. As mention by Bryman (2012), literature review is needed to know the previous research, concept and theories that relevant, controversies happen before and inconsistencies and also unsolved research question. Information and explanations got from the theory, findings, and other research materials such as government report, law, academic research, journal and electronic source will be used to develop this research. These reference materials will function as framework to formulate and solve the problem faced. Beside literature review and document review, this research will also explore deeper about the implementation of airport privatization in United Kingdom.

### **3.5 Qualitative Approaches**

There are two kind of qualitative approaches used in this research. These methods of analysis are used based on the information and data owned.

#### **1. Content Analysis**

Content analysis is an approach that analyzing reference materials (verbal and visual) (Bryman, 2012). When using to analyze the document and text, it can be applied in many different sources such as newspaper, text and respond to questions (Hancock et al, 1998). This approach also refers to quantitative research.

## 2. Narrative Analysis

This approach is focused on stories/narratives about people or event that happen (Hancock et al, 1998). It is an approach which based on temporal sequence (Bryman, 2012). By using this approach, we will get some information about the process from the beginning until the end.

### **3.6 Reflection**

By conducting this methodology, the research will get an in-depth result. It will give specific and detail information about the chosen theme. The research can also give explanation and interpretation about the context by using good theoretical framework. Although using several statistic calculations, it is only supporting data. However, difficult to generalize the result often faced by this research method. Not all the lesson can be generalized for another case. It depends on the context and condition of the case area. Another difficulty faced in this research is using a lot of data. Some dilemmas appear as a result of using many data such as hard to integrate the data from many sources into one connection; the judgement become too subjective and not academic; and also the complexity of data.

**Table 3.1 The Linkage between research question, data needs, analysis, output and indicator**

<b>Research Question</b>	<b>Data Requirement</b>	<b>Source Data</b>	<b>Method of Data Collection</b>	<b>Method of Analysis</b>	<b>Output of Analysis</b>	<b>Indicator</b>
What is defined as airport privatization?	Law and regulation	Document (archive, report, law, journal, academic research)	Document review	Content Analysis	- Definition - Form - Strengths and weakness	Clear definition about airport privatization
What lessons could be learned from the experiences in the United Kingdom in implementing different strategies in airport management?	Law and regulation about managing airport in UK	- Case study : UK - Document (archive, report, law, journal, academic research)	Document review	- Narrative Analysis - Content Analysis	Different strategies implemented in UK	Clear explanation about lesson learned
What are the possible and adaptable approaches of privatization in airport management for Indonesia through the experiences in the United Kingdom cases?	- Result 1 - Result 2 - Law and regulation about managing airport in Indonesia	- Document (archive, report, law, journal, academic research)	Document review	Content Analysis	- Constrains in implementation different strategies - Possible and adaptable approach	Potential strategies which can be implemented in Indonesia

(Source: Author)

CHAPTER 4  
PRIVATIZATION OF AIRPORT SERVICE IN  
UNITED KINGDOM



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## **CHAPTER 4**

### **PRIVATIZATION OF AIRPORT SERVICE IN UNITED KINGDOM**

#### **4.1 Introduction**

This chapter will highlight about definitions implementation of privatization in UK. There are five main parts, as follow: First, describes historical airport management in UK. Second, defines about what underlying behind the privatization. Third, explain about the process of airport privatization. Fourth, it analyzes the privatization in UK. Fifth, lesson learned from UK privatization will be explained in this part.

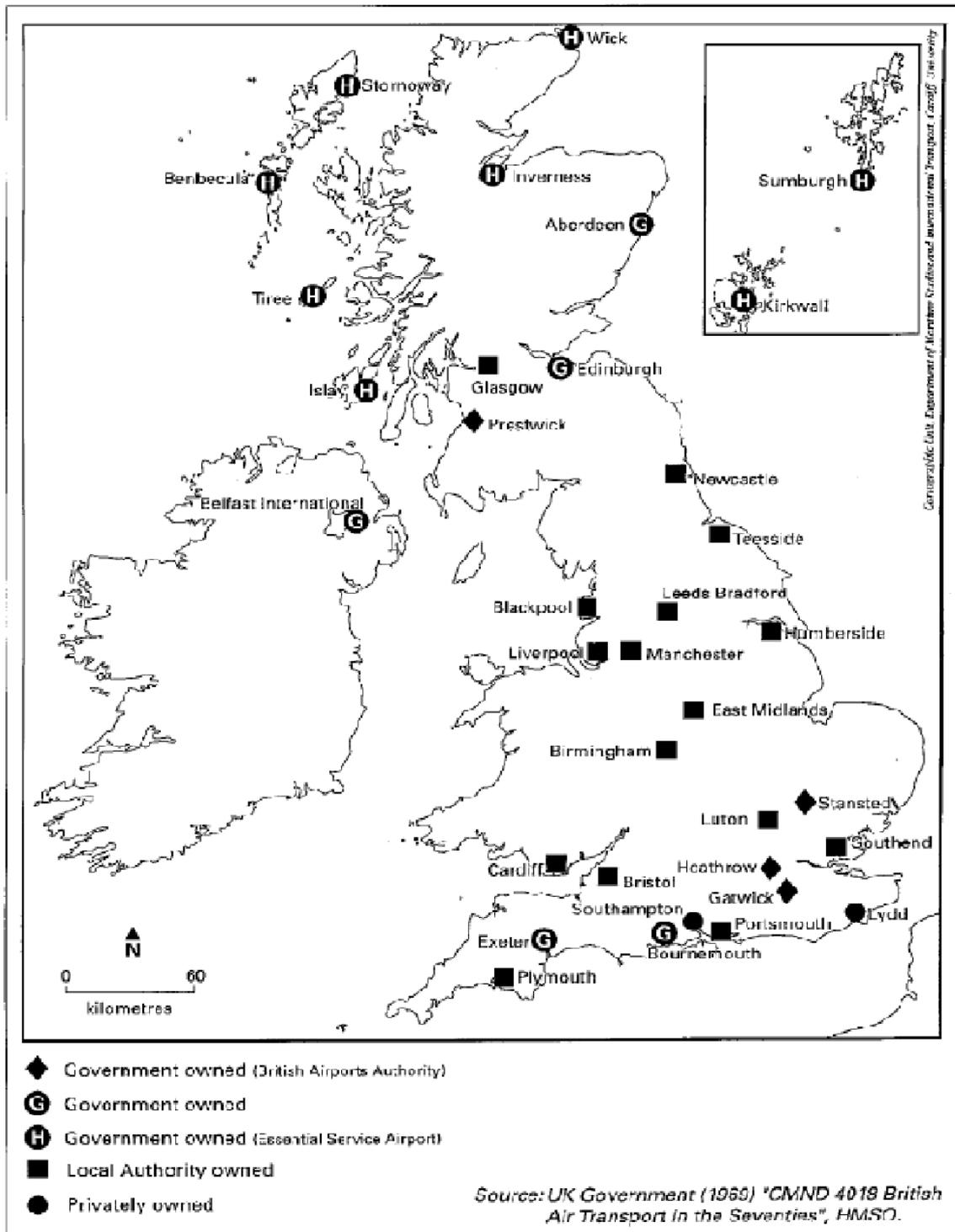
#### **4.2 Historical Airport Management in United Kingdom**

The airport ownership scheme in United Kingdom is changing through time cause by different motives. In 1939, all airports were under government control for military use because of World War II. When the war ended, a White Paper issued by the UK government for funding the airports. In 1947, the ownership and management of 44 airports in UK were under control by Ministry of Civil Aviation. In 1961, the government transfer the unprofitable airport to local authority ownership. This movement is taken for decreasing financial burden.

British Airport Authority (BAA), a public corporation, is founded in 1966 to manage, own and the main airport in UK. In that time, BAA controls the four main airports; Local Authority manages 19 airports and the rest in owned by other government department (14 airports). The problem is raised from policy in developing the airports, even though almost all airports were owned by government. The strategic planning of the airport was not taking account of the social and economic aspects. The authority was not getting support from the government in developing the airport. Microsoft (cited in Humphreys 1999) stated that as a result, the main municipal airports developed pairs, separated by about 70 kilometres. From those distances, it would take two hours for people to get to airport. Another impact of this policy is the authority could not invest in infrastructure. They had to have support from taxpayers' money to develop new infrastructure.

In reverse to that situation, different condition faced by BAA airports. The airports under BAA were developed in a coordinated manner. For example, Heathrow is expanded with bilateral air service agreement and traffic distribution rules in order to become the main international scheduled service airport (Humphreys, 1999). The same method used when BAA took control on Scotland airports; Aberdeen, Edinburgh, Glasgow and Prestwick. Until

1972, the Board of Trade handled eight airports in Scottish Highlands and transferred the ownership to CAA. By 1985 the pattern ownership separated with CAA managing on the northern periphery of Britain and BAA airports in lowland Scotland and London.



**Figure 4.1 Ownership structures of UK airports 1967**  
(Source: Humphreys, 1999)

### 4.3 Airport Privatization and Commercialization

The Airports Act launched in 1986 became a milestone in UK aviation industry. As Morgan said (cited in Humphreys 1999), this act was a result of the UK Thatcher Government which changed economic policy to market based between 1972 and 1992. From the forecast had done, the air travel demand will doubled in 2005, creating a financial burden in developing airport infrastructure. Another reason underlying the 1986 Airport Act was the 1985 Airports White Paper. In this white paper, explained the government's objectives policy (UK Government, 1985) as follows:

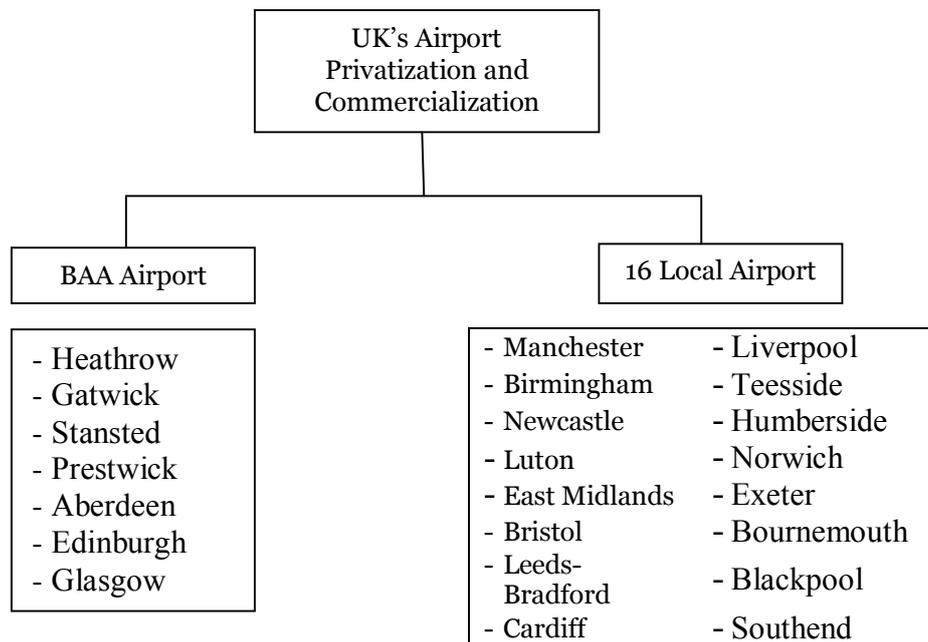
- *“To encourage enterprise and efficiency in the operation of major airports by providing for the introduction of private capital.*
- *Air transport facilities should not in general be subsidised by the tax payer or the rate payer. Airports, who ever their owners, should normally operate as commercial undertakings”.*

The implementation of The 1986 Airport Act was separated in two parts (Figure 4.2). The first parts is when BAA, a government owned company, transferred into a private company. By using share flotation, the government sales BAA in stock exchange. Seven airports (Heathrow, Gatwick, Stansted, Prestwick, Aberdeen, Edinburgh and Glasgow) were under control BAA and now had to run their operation without subsidies from BAA plc.

Part two of the Airport Act carried out in the 16 local airports, 14 of them were in UK regions. In accordance with the act, airports with an annual turnover more than one million pounds in two of the previous three years, had to be set up as public companies under control by local authority. The companies will be held by original local authority as a shareholder. Airports could no longer allow accepting funding from their owner and became financially self-sufficient. The act created an opportunity for private capital and private ownership to join in managing airports. This chance appears because local authority had the right to sell part or their entire share in order to operate the airport.

The 16 airports, hold around 30% of UK air passenger traffic, were transformed into financially self-sufficient, profit-making businesses that could no longer be run as municipal facilities maintained by subsidies from their local government owners. These airports began to operate under a commercialised ownership structure. Early in 1990, Luton, a London area airport outside BAA ownership, became the first municipally owned airport to be sold to private sector. This action was based on the inability from local authority to provide £100 to £150 million capital for developing the airport (Doganis, 1992). From the selling, Luton

Borough Council, the municipally owned the airport, expected to raise fund £30 to £45 million pounds.



**Figure 4.2 UK's Airport Privatization and Commercialization**  
(Source: Adopter from Humphreys, 1999)

#### 4.4 Privatization Process

Miller (1994) explained that one of the main goal of the UK's privatization "*is to distribute wealth more equally among the population by increasing the number of people who own stock in British businesses*". By owning stock, the people would feel responsible for the success of the company. Generally, four ways usually used to privatize state owned company in UK (Miller, 1994): 1. Public flotation on the Stock Exchange; 2. Employee and/or management buyouts; 3. Private placements with a group of investors; and 4. Trade sales, in which a company is sold to a single firm or to a group of firms.

In case of airport privatization and commercialization in UK, the methods used are public flotation and trade sales. BAA plc was privatized by the government, using full flotation with subscription price of £2.40 per shares (Betancor and Rendeiro, 1992). Totally, 500 million shares were sold at that time. Single share (golden share) is kept by the government and 25 % of portion was booked for employees. Individual participation was restricted to 15 % to avoid capital concentration. At first, foreign capital participation was

also restricted up to 10 %. Private participation increased and reached 95 % of total shareholders.

Different from BAA, municipality owned airports were commercialized in a form of trade sales. Starkie (2008) stated that in Newcastle-upon-Tyne airport, local government still holds a largely part of shares. Some municipalities maintain their shares with small amount or tiny shares. However, not all airports were developed by involving private sector. One of the success examples is Manchester airport. The fourth biggest airport in UK is still under consortium of local government in North West England.

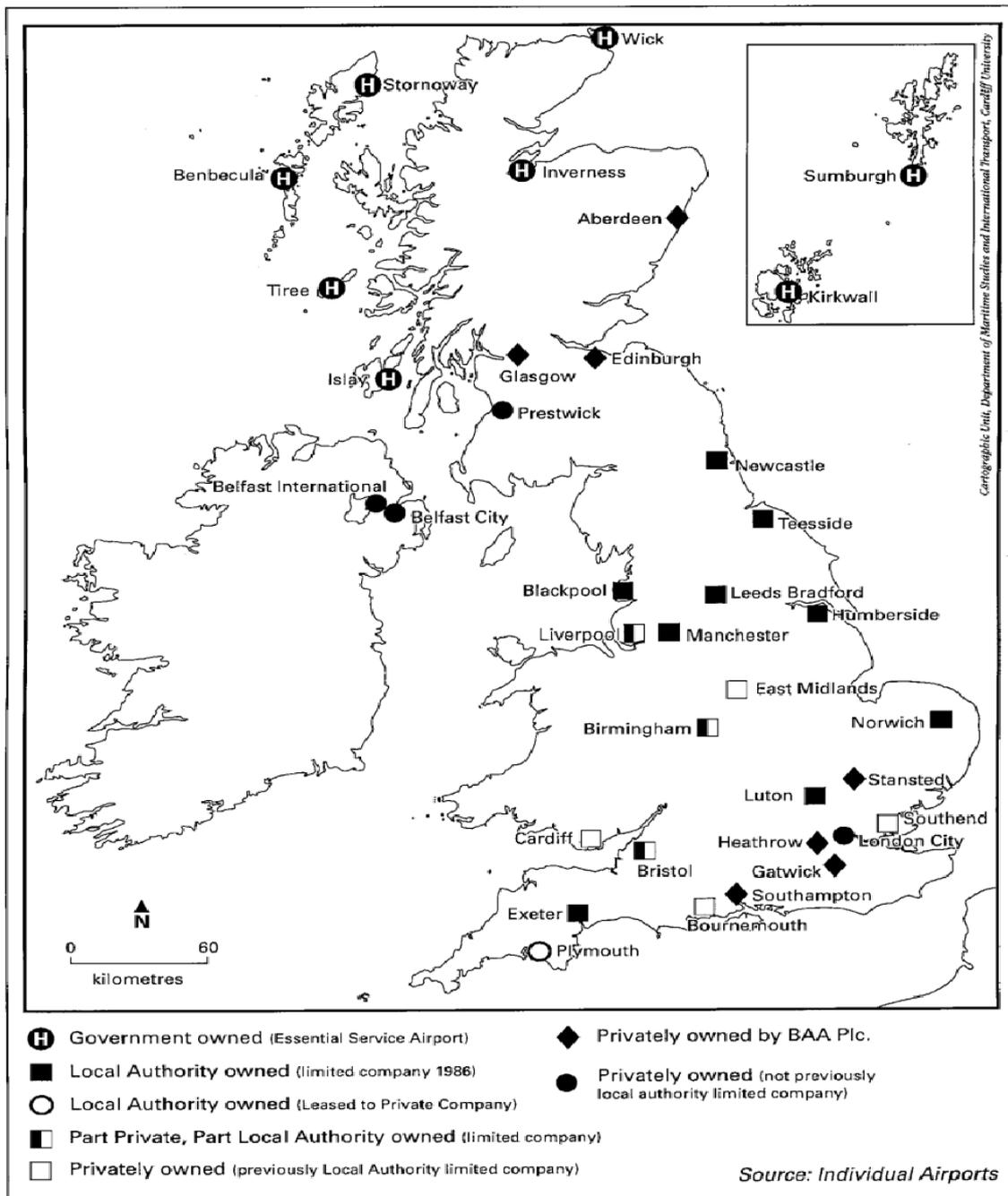
The process for considering various forms of privatization involves a multi-step process starting with identification of the owner's goals and objectives, familiarization with the specific strategies available, comparison of those goals to those of other stakeholders, identification of ways to mitigate stakeholder risks, review of the transaction's complexity and risk, and valuation of the transaction.

#### **4.5 Analysis of Data**

Based on the story of airport privatization in UK, the research tries to analyze the criteria that were set in analytical framework in previous chapter. The three criteria will also use to Indonesia condition. The criteria are:

1. Type of privatization/ownership

Airport privatization in United Kingdom has been developed in several ways. There are three main type of privatization applied there. This form of privatization was the impact of the 1986 Airport Act. Figure 4.3 describes clearly about the categories of ownership prevailed among the commercialised airports in 1997 (Humphreys 1999; CAA 2011).



**Figure 4.3 Ownership structures of UK airports 1997**  
(Source: Humphreys, 1999)

a. Fully owned by a private company.

The number of airports which developed in this model is quite a lot. All airports under control BAA (Heathrow, Gatwick, Stansted, Prestwick, Aberdeen, Edinburgh, Glasgow and later on Southampton) are included in this category. Besides that, several municipal airports also developed in this way. The major reason why the airport developed such way is to increase the funding in order to expand the airport (Table 4.1). The revenue gained meantime can not sufficiently

used for expansion. The development is necessary to anticipate the forecast of passenger growth in the future.

**Table 4.1 Privatised Airports**

<b>Airport</b>	<b>Buyer</b>	<b>Reason for sale</b>	<b>Price (£M)</b>	<b>Planned investment (£M)</b>	<b>Other comments</b>
East Midlands	National Express Group, August 1993	Access to finance for expansion	40.0	30.0	<ul style="list-style-type: none"> <li>- Aircraft handling fees reduced as part of a strategy to become a low cost, high-throughput airport</li> <li>- Pursuit of airport management contract worldwide</li> <li>- Integration with intercity bus business</li> </ul>
Cardiff	Thomas Bailey International, March 1995	<ul style="list-style-type: none"> <li>- Access to finance for expansion.</li> <li>- Local government reorganisation in Wales</li> </ul>	37.5	20.0	<ul style="list-style-type: none"> <li>- retail floor space trebled</li> <li>- £7 million terminal development completed.</li> <li>- purchase of 22 travel agents</li> <li>- operation of air services</li> </ul>
Bournemouth	National Express Group, February 1993	Access to finance for expansion	7.2	2.0	Development of revenue from land assets
Southend	Regional Airports Ltd, March 1994	Survival in the face of bankruptcy	Undisclosed	1.0	<ul style="list-style-type: none"> <li>- Sale of land</li> <li>- Focus on revenue from land assets</li> </ul>

(Source: Humphreys, 1999)

**b. Part-privatized airports**

The underlying reasons part-privatized airport introduced is the same reasons as full privatisation. Limitation in obtaining funds was the key factor of developing

the airport. In contrary, the government, as the owner of airport, is not willing to give the power to control. The authority tries to keep their domination in airport and attempt to gain investment in developing the airport. Their emphasis on commercial revenue was not as high as full privatized airport.

**Table 4.2 Part - Privatised Airports**

<b>Airport</b>	<b>Buyer</b>	<b>Reason for sale</b>	<b>Price (£M)</b>	<b>Planned investment (£M)</b>	<b>Other comments</b>
Liverpool	1. BAe 76 % 1990 2. Peel Holdings 76% 1997	Survival	22	10	Contracting out strategy (only six employed)
Birmingham	Nat West and Aer Rianta 40% Private 11%	Access to finance for expansion.	130	400	- previously expanded through getting BA to invest in Euro hub terminal - Ideological move
Bristol	First bus	Access to finance for expansion	40	40	- Filton proposal delayed it. - Ideological move.
Southend	Regional Airports Ltd, March 1994	Survival in the face of bankruptcy	Undisclosed	1.0	- Sale of land - Focus on revenue from land assets

(Source: Humphreys, 1999)

c. Public airport

Although the trend to privatize the airport is increasing in UK, the public airport still can survive in order to support operational and development. Leeds-Bradford, Luton, Manchester, Newcastle, Norwich and Teesside are the airport which still in local government control. Moreover, Manchester now is becoming the fourth largest airport in UK and taking control several airports in Australia (Humphreys, 1999). They argued that privatization brings slight differences to their performance.

However, accordance with time, there was a change about the composition of the three categories above, especially the local airports (Table 4.3). The 16 local airports change their form into better form. Some airports change from privatized airport to public airport such as East Midlands and Bournemouth. Several airports only change the ownership and some airports turn from public airport to part-privatized or to full-privatized.

**Table 4.3 The Change of Ownership**

<b>Airport</b>	<b>Shareholders</b>	<b>Year first privatised</b>	<b>Private interest (%)</b>
Manchester	Manchester Airport Group plc	Still in public sector	0
Birmingham	Ontario Teachers' Pension Plan and Victorian Funds Management Corporation (VFMC), Employee Share Trust and local authority	1995	48
Newcastle	Copenhagen Airports and local authority	2001	49
Luton	Abertis	30 year concession began in 1998	100
East Midlands	Manchester Airport Group plc	1993 but now back in public sector	0
Bristol	Macquarie European Infrastructure Fund 1, Ontario Teachers' Pension Plan, MAp Airports	2001	100
Leeds-Bradford	Bridgepoint Capital	2007	100
Cardiff	Abertis	1995	100
Liverpool	Peel Holdings Plc and Vancouver Airport Services	1997	100
Durham Tees Valley	Peel Holdings Plc and local authority	2003	75
Humberside	Manchester Airport Group plc and North Lincolnshire Council (17.3%)	Still in public sector	0
Norwich	Omniport and local authority	2004	80.1
Exeter	Regional and City Airports Ltd. (Balfour Beatty)	2007	100
Bournemouth	Manchester Airport Group plc	1995 but now back in public sector	0
Blackpool	Regional and City Airports Ltd. (Balfour Beatty) and local authority	2004	95
Southend	Stobart Group	1994	100

(Source: Ison et. al, 2011)

Generally, the type of UK's airport privatization is summarized in Table 4.4. From the UK's experience, there is a wide variety of ownership developed. Airports in UK are occupying all quadrants which available, partnership happens between government-government until private-private. These types of ownership have their own

characteristics with different level government involvement. Cooperation happens between all kind of ownership and management.

**Table 4.4 Privatization of UK's Airport**

		Ownership	
		Government	Private
Management and Strategic Direction	Government		
	Private		

(Source: Author)

## 2. Institutional

Several regulation issued by the UK government is to support the implantation of airport privatization. The Aviation Act 1986 not only valid for airports under BAA's control, but also for the local airport that have turnover more than one million per annum. The act does not allow the airport to use financial from taxpayers' money in order to operate the airport. The government also still retain their "golden share" to protect the national interest and prevent excessive takeover (Humphrey et al, 2001). Civil Aviation Authority (CAA) was pointed to be the regulator in UK aviation business. The CAA focused on (caa.co.uk):

- *“Enhancing aviation safety performance by pursuing targeted and continuous improvements in systems, culture, processes and capability.*
- *Improving choice and value for aviation consumers now and in the future by promoting competitive markets, contributing to consumers' ability to make informed decisions and protecting them where appropriate.*
- *Improving environmental performance through more efficient use of airspace and make an efficient contribution to reducing the aviation industry's environmental impacts.*
- *Ensuring that the CAA is an efficient and effective organisation which meets Better Regulation principles”.*

Another institution which involved in supporting airport privatization in UK is Competition Commission (Ison et al, 2011). This commission's duty is to prevent the unfair competition between the airports. One of the impacts of privatization is creating airport groups beside BAA (Table 4.5).

**Table 4.5 Regional Airport Groups in UK**

<b>Name of Group</b>	<b>Regional airports forming part of group</b>
Peel Airports part of the Peel Group	Full owner of Liverpool John Lennon Airport, City Airport Manchester (Barton), Robin Hood Airport Doncaster Sheffield and joint owners of Durham Tees Valley Airport (75%)
Manchester Airport Group	Manchester, Humberside (82.7%), Bournemouth and East Midlands
Abertis	Cardiff, Belfast and other international airports
Macquarie Airports Group	Bristol and other international airports
Stobart Holdings	Southend and Carlisle
Regional and City Airports	Exeter, Blackpool
Copenhagen Airports	Newcastle and other international airports

(Source: Ison et al, 2011)

With the growth of airport groups, it will create more possibility of monopoly. To prevent that, Competition Commission is doing some precaution action. In 2009, the commission forced BAA to sell Gatwick (Ison et al, 2011). The commission saw that BAA controlled 90% of traffic passenger in London area and over 50% of the UK's passenger through Gatwick, Heathrow and Stansted. In 2011, the committee also insisted BAA to sell one of two their Scotland's airports, Edinburgh or Glasgow, in order to prevent monopoly (BBC, 2011).

### 3. Performance

The act also gave power to airport management in decision making considering airport charges. Before the act issued, airport charges and staff wages were set and regulated by the National Council for Airports (Ison et al, 2011). Regulation of airport charges and accounts was introduced by the government and administered by the Civil Aviation Authority (CAA) to protect the airlines from monopoly abuses by airport operators. However, only four major airports in UK (Heathrow, Gatwick, Stansted and Manchester) received price cap regulation charges released by CAA. The strong position in the market became the reason for CAA imposed it on them by implementing "single till" principle, where all income (aeronautical and commercial) is considered before setting the aeronautical charges. For the rest, transparent accounts must be produced by the airports for CAA to check and each airport had to apply to the CAA in order to levy aeronautical charges.

In order to retain their operations and obtain funding, the airports are under the control of local government doing diversification business. They are not only focusing on airport, but also another business (Table 4.6). Manchester airport, for example, was expanding their business in hotels and offices. Luton, a 30 years concession airport, was also

spreading their strategic business in hotel and office development beside travel agency. Moreover, BAA also expanded their business. They invested in retail property and hotel development. Martin and Parker (2003) stated that BAA was one of the UK's landlords. Besides that, BAA also evolved their business in railway by taking over Heathrow Express from British Rail.

**Table 4.6 Diversification Business of Local Airports**

<b>Airport</b>	<b>Business Activities</b>
Manchester	New runway and terminal
	Discounted landing fees
	Increase retail
	Develop hotels and offices
	Environmental partnership with community
	Lobby government to lift borrowing restrictions
	82,7% ownership of Humberside
	Offer airport consultancy services
	Management contracts at two Australian airports
	Development of business park
	Joint venture with British Airways
Newcastle	Contracting out of baggage handling and other services
	Increased retail
	Discounted landing fees
	Growth in marketing department
	Terminal extension
Norwich	Lease land-hangars and reservations centre
	Travel agency business started
	Air service operated
	Retail increase
Luton	Run as concession
	Attractive start-up charges for airlines
	New terminal and parkway station
	Increased retail space
	Travel agency
	Hotel and office development

(Source: Humphreys et al, 2001)

## 4.6 Lesson Learned

Several lessons can be taken based on the experience of airport privatization in UK. These lessons might be useful for other country which wants to implement privatization. The lessons can be summarized below:

### 1. Type of privatization

Based on the UK's experience, privatization can be transformed into several forms. This division can be seen from the involvement of government/public sector. In fully private airport, the role of government is acting as a regulator. Private sector controls the ownership, management until the strategic planning. Part-privatize airport means that there was some share of power between the public and private sector. The government, in this type of privatization, sets the rates and access to user. The government sets the policy in management and strategic planning and the private sector implement it. The last type, public airport, is when the ownership, management and strategic planning in the government hand. In this type, the control is in civil service and politics. From the three models used, there no single best model. The composition of those three changes according to the needs.

### 2. Institutional

Although UK models known as the most privatizes in the world, the role of government still become important. The government maintains their golden shares in order to protect national interest and to avoid hostile takeover bids. The government, through regulation, controls the airport charges for several airports. Competitions among airports are maintained in order to protect the passengers and airlines. One of the regulations that give a different meaning is the UK's government allows the local airport to borrow money from private sector. With this rules, the local did not have to loss their power and control over the airport and still can achieve funding.

### 3. Performance

There is no doubt that privatization can be overcome the financial burden faced to develop an airport. Based on UK's case, turn out that not all airports developed in privatized manner. Instead, several airports that were developed in privatized manner are changing to public airport such as East Midlands, Bournemouth and Humberside. Manchester airport, the fourth largest airport in UK, is becoming the success local owned airport in UK. Manchester airport successfully developed its business by taking over some of the airports in and outside the UK. The regulation that allows the local authority to borrow money from private sector made the owner of airport no

need to sell their shares and kept the ownership. However, several airport also changed the ownership to private sector because need funding to develop the airport. Commercial revenues and financial performance will increasing, no matter what the ownership models, as long as management placed on commercial basis, restricted from receiving public subsidy and became financially self-sufficient.

In addition to do business in aviation, airports in UK also develop another business outside. BAA has moved to retail property investment, shopping facilities in hospitals, built and operating a new railway line and hotel development. Manchester and Luton are also doing diversification in hotel and office development. Diversification is seen as another way to gain money for development and operation. Private shows a greater degree of diversification in commercial activities than public airports driven by their need to maximize shareholder value.

#### **4.7 Reflection**

Airport privatization in UK is the first and the complete models in the world. They way that they privatize the airport can become a lesson for another country. Many success story and failure can be taught from the story. Regulation, supporting institutions and new strategy implemented with the intention that making the privatization works. But, not all lesson learned obtained can applied in every condition. The context and the condition have to take into account so that privatization works well.

# CHAPTER 5 ANALYSIS OF AIRPORT MANAGEMENT IN INDONESIA



Syamsuddin Noor Airport  
Copyright : Reggie Sigarlaki

## CHAPTER 5

### ANALYSIS OF AIRPORT MANAGEMENT IN INDONESIA

#### 5.1 Introduction

This chapter will highlight about brief overview airport management in Indonesia. First, it will give a short description about history of airport in Indonesia. Second, defines about organization and functionally of airport in Indonesia. Third, explain about constrains facing in development airport. Fourth, describes what possibilities of implementation privatization in Indonesia

#### 5.2 Historical Airport Management in Indonesia

Airport already existed since the Dutch colonialism in Indonesia. It began with the first airport development in 1934 and started to operate on 8 July 1940. The airport was called Luchthaven Kemayoran and operated by Dutch company, KNILM (*Koningkelije Nederlands Indische Luchtvaart Maatschapij*). In the first operation, the company flew their DC-3 Dakota from Tjililitan Airport (known now as Halim Perdanakusuma Airport).

The management of the airport was changed under the revolution. At the beginning, it was under KNILM's control in 1940-1942 and ended with Japanese invasion in 1942-1945. The airport was also under control by The Allied in the period of 1945-1950. After the independent, the Indonesian Government took control over the airport until it closed in 1984. The Indonesian Government formed Djawatan Penerbangan Sipil, an institution which managed the airport and civil aviation, to operate Kemayoran Airport. This body, also known as Directorate General of Civil Aviation, is responsible to Ministry of Transportation and Ministry of Public Works.

At that time, Kemayoran Airport was the only international airport that owned by the Indonesian Government. Based on Government Regulation Number 33/1962, the state enterprise which organizes airport, established in 1962. The company, Angkasa Pura Kemayoran State Enterprise, will be taken over all assets and operational activities of Kemayoran Airport from Djawatan Penerbangan Sipil. After two years transition, Angkasa Pura Kemayoran State Enterprise is full in charge of Kemayoran Airport since 20 February 1964. On 17 May 1965, based on Government Regulation Number 21/1965, the company name's changed to Angkasa Pura State Enterprise with the purpose to get more opportunity in managing other airports in Indonesia (Angkasa Pura I, 2008).

Gradually, many airports were managed by Angkasa Pura State Enterprise. Ngurah Rai Airport-Bali, Halim Perdanakusumah Airport-Jakarta, Polonia Airport-Medan, Juanda Airport-Surabaya, Sepinggan Airport-Balikpapan and Sultan Hasanuddin Airport-Ujungpandang were joined in Angkasa Pura State Enterprise management. On 19 May 1987, based on Governance Regulation 25/1987, the dividing region of airport management implemented. The name Angkasa Pura State Enterprise was changed to Angkasa Pura I Public Company and controlled the airport in central and eastern region of Indonesia. Until now, 13 airports operated under Angkasa Pura I Public Company management (Angkasa Pura I, 2012). The airports are:

1. Ngurah Rai Airport – Bali.
2. Juanda Airport – Surabaya.
3. Hasanuddin Airport – Makassar.
4. Sepinggan Airport – Balikpapan.
5. Frans Kaisiepo Airport – Biak.
6. Sam Ratulangi Airport – Manado.
7. Syamsudin Noor Airport – Banjarmasin.
8. Lombok International Airport – Lombok.
9. Pattimura Airport – Ambon.
10. Ahmad Yani Airport – Semarang.
11. Adisutjipto Airport – Yogyakarta.
12. Adisumarmo Airport – Surakarta.
13. El – Tari Airport – Kupang.

Based on Government Regulation Number 20/1984, the Indonesian Government also established Angkasa Pura II Public Company, a state-owned company, which handled airport in western region of Indonesia. Initially, Angkasa Pura II was given a task to manage Soekarno – Hatta International Airport and Halim Perdanakusuma Airport. Until now, Angkasa Pura II operates 13 airports in Indonesia such as (Angkasa Pura II, 2012):

1. Soekarno – Hatta International Airport – Banten.
2. Halim Perdanakusuma – Jakarta.
3. Kualanamu Airport – Medan.
4. Minangkabau Airport – Padang.
5. Silangit Airport – Tapanuli Utara.
6. Sultan Syarif Kasim II Airport – Pekanbaru.
7. Sultan Thaha Airport – Jambi.

8. Sultan Mahmud Badaruddin II Airport – Palembang.
9. Raja Haji Fisabilillah Airport – Tanjung Pinang.
10. Depati Amir Airport – Pangkal Pinang.
11. Husein Sastranegara Airport – Bandung.
12. Supadio Airport – Pontianak.
13. Sultan Iskandar Muda – Aceh.



**Figure 5.1 Indonesian Airspace**  
 (Source: Angkasa Pura I, 2008)

### 5.3 Organization and Functionally

In Indonesia, airport can be distinguished in function, utilization, hierarchy and classification. According to Aviation Act Number 1/2009 article 192, airport in Indonesia is categorized into public airport and specific airport. The term public airport means “an airport used for serving the interests of the public”. Based on Ministry Regulation Number 69/2013, Indonesia has 237 public airports spreading around the country. From the total, 13 airports

were under control of Angkasa Pura I and 13 airports also under management of Angkasa Pura II.

The remaining is operated by local government bodies (technical operation units) (TOU/UPT) for the Directorate General of Civil Aviation (DGCA). In addition to that, they were 15 airports owned and operated privately by the companies for business purpose only (Transportation Statistics, 2012). These airports are usually used by oil and gas companies, farming companies and etc. This kind of airport is known as special airport. As stated in Aviation Act 2009 article 1, “*Special Airport is an airport used only for serving own interests in supporting its main business activities*”.

An airport shall serves as a place of two main functions of activities, governance and entrepreneurship. Governance means airport become a work place for the government institutions serving for public according to regulation. The activities conducted relate to supervising aviation activities, customs, immigration and quarantine. The entrepreneurship activities consist of two main services. Based on Aviation Act Number 1/2009 article 231, business activities cover airport services and airport-related activities. Moreover, in the article 232 explained that:

1. Airport services shall cover aircraft services, passenger, cargo and post services, consisting of supplies and/or development of:
  - a. facilities for aircraft landing, taking-off, manoeuvring, parking, and airplane hangar;
  - b. terminal facilities for passenger, cargo and post services;
  - c. facilities for electronics, electricity, water, waste installation; and



Figure 5.2 Airports in Indonesia  
 (Source: Ministerial Regulation 69/2013)

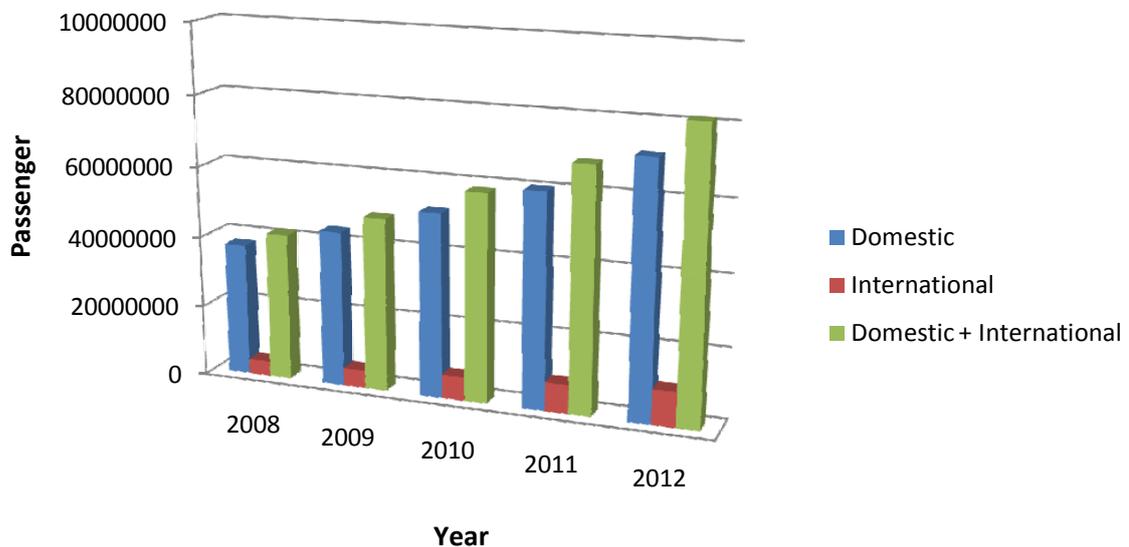
- d. land for buildings, field, and industry and other buildings or construction connected to air transportation smooth operation.
2. Airport-related services shall cover the following activities:
    - a. services related to aircraft operation services at the airport, consisting of:
      - 1) Provision of airplane hangar;
      - 2) Aircraft maintenance workshop;
      - 3) Warehouse;
      - 4) Aircraft catering;
      - 5) Aircraft technical ground handling;
      - 6) Passenger and baggage services, and
      - 7) Cargo and post handling
    - b. services related to passenger and cargo services support consist of:
      - 1) Availability of lodging/hotel(s) and transit hotel;
      - 2) Availability of shops and restaurants;
      - 3) Motor vehicle storage;
      - 4) Health services;
      - 5) Banking services and/or money changer(s); and
      - 6) Ground transportation.
    - c. services related to provide value added to airport management consist of:
      - 1) Availability of play-ground and recreation;
      - 2) Availability of office business facilities;
      - 3) Availability of sport facilities;
      - 4) Availability of education and training facilities;
      - 5) Fuel station for motor vehicles; and
      - 6) Advertisement.

Based on the utilization, airport in Indonesia can be determined to domestic and international airport. Domestic means they are serving the flight route in the country and international associated with serving the flight route to or from in the country and also in the country. The air travel passenger in Indonesia is indicated positive trend (Table 5.1). Data shown in 2012, the number of passenger that choosing air transportation is 19.04 % increased 1.98 % from year before.

**Table 5.1 Air Travel Passenger 2008-2012**

Tahun	Passenger			% Growth		
	Domestic	International	Domestic and International	Domestic	International	Domestic and International
2008	37,406,437	4,102,210	41,507,647	-4.49	28.64	-1.99
2009	43,808,033	4,969,913	48,777,946	11.86	55.85	15.17
2010	51,775,656	6,614,937	58,390,593	18.19	33.10	19.71
2011	60,197,306	8,152,133	68,349,439	16.27	23.24	17.06
2012	71,421,464	9,938,291	81,359,755	18.65	21.91	19.04

(Source: Transportation Statistics, 2012)



**Figure 5.3 Air Travel Passengers 2008-2012**

(Source: Transportation Statistics, 2012)

Another categorization in Indonesian airport management concerns in hierarchy of functions. Based on this, airport developed into two categories, hub airport and spoke airport. According to Ministry Regulation Number 69/2013, hub airport can be divided based on their scale of coverage service into:

1. Primary (main).

Airport acts as a supporting to national activities (*Pusat Kegiatan Nasional*), which serves passenger more than or equal to 5 million per annum. Examples of this kind of hubs are Kualanamu, Soekarno-Hatta, Juanda, Sepinggan and Hasanuddin.

2. Secondary.

In this type of hub, airport acts as a supporting to national activities (*Pusat Kegiatan Nasional*), which serves passenger between 1 million until 5 million passenger per annum. Example of this type are Minangkabau, Sultan Syarif Kasim II, Hang Nadim and others provincial capital city.

3. Tertiary.

Airport acts as a supporting to national activities (*Pusat Kegiatan Nasional*), which serves passenger between 500000-1 million passenger per annum. Sultan Iskandar Muda, H AS Hanandjoeddin and Fatmawati are the sample of tertiary hub airport.

Spoke airport is the airport that has local coverage activities and supported local economic development by connecting with hub airport. Small airports in Kalimantan and Papua are act as spoke airport in Indonesia.

**Table 5.2 The number of airports by function and utilization in Indonesia**

Indonesia Islands	Domestic		International	
	Hub	Spoke	Hub	Spoke
Sumatera	5	24	5	2
Jawa		9	7	
Bali-Nusa Tenggara		16	3	
Kalimantan	3	28	3	
Sulawesi-Maluku Utara	3	20	7	1
Papua-Maluku	3	93	3	1
Total	13	192	28	4

Grand Total 237 airports

(Source: Ministry Regulation 69/2013)

Based on runway length, airports in Indonesia divided in to several groups. This division is based on Aeroplane Reference Field Length (ARFL). Transport Canada explained that ARFL is “the minimum field length required for take-off at maximum certificated take-off mass, sea level, standard atmospheric conditions, still air and zero runway slopes, as shown in the appropriate aeroplane flight manual prescribed by the certificating authority or

equivalent data from the aeroplane manufacturer. Field length means balanced field length for aeroplanes, if applicable, or take-off distance in other cases”.

**Table 5.3 Airport Category Based on Runway Length**

Runway Length (m)	Type of Aircraft	Number of Airports
ARFL < 800	C 212, DCH Twin Otter	48
800 ≤ ARFL ≤ 1200	ATR 42, Xian M60, Dash 8	75
1200 ≤ ARFL ≤ 1800	B737, F100, Bae 146, F50, ATR 72	61
1800 ≤ ARFL	B747, B777, B767, B737, A320	53
TOTAL		237

(Source: Ministry Regulation 69/2013)

From table above, most of the airports can only handle small and narrow body aircraft. This kind of aircraft only used in domestic flight. Domestic route is the biggest market that contested by airlines in Indonesia. Besides that, the Indonesian Authority is also making a program to promote remote areas that spreading around the country. The program, “pioneer airports”, is launched to connect remote areas which unserved by other modes of transportation and unprofitable. Carnis and Yuliawati (2013) stated that 38 pioneer airports existed in Indonesia. These airports managed directly by Directorate General of Air Communication (DGAC) because its low traffic demands.

#### **5.4 Constrains Facing in Development Airport in Indonesia**

As mentioned before, airports in Indonesia have several roles. In order to make the roles running well, an airport must be developed in proper way. For so long, it has become the government obligation to provide infrastructure for the airport. However, several constrains faced by the government to implement it. The hindrances encountered such as:

1. The large number of airports

The large number of airport is existing became the difficulty in developing the airport. With 237 airports, the Indonesian Authority has to make priority which airport had to develop first. Whereas, all the airports are have the same role supporting development of the country. Prioritizing must in line with the urgency, hierarchy, needs, and availability of funds.

2. Funding

Developing airport infrastructure needs a huge funding to complete the development. From Figure 5.4, the total fund required from 2010-2014 reaches of amount of 53.8 billion IDR. The number will increase in the future because the growth of passenger and aircraft also increase.

Type of project	2010	2011	2012	2013	2014	Total
Runway	1,688,394,611.62	518,280,820.00	1,138,742,890.00	7,815,426,257.00	826,408,887.45	11,987,253,466.065
Terminal	31,250,700.00	15,110,500.00	854,535,600.00	2,276,270,200.00	8,430,200.00	3,185,597,200.000
Building	202,232,192.00	5,664,778.00	3,960,292.00	9,550,292.00	14,965,102.00	236,372,656.000
Land Preparation/Certification	1,055,594,234.75	260,932,500.00	354,527,500.00	422,032,500.00	401,874,691.54	2,494,961,426.293
Study	4,500,005.00	3,021,505.00	3,765,005.00	3,763,005.00	3,018,005.00	18,067,525.000
Supporting Facilities	2,491,389,221.00	18,009,300,004.00	5,002,500,004.00	700,004.00		25,503,889,237.000
Electricity		2,600,000,000.00	2,600,000,000.00	2,600,000,000.00	2,600,000,000.00	10,400,000,000.000
Total						53,826,141,510.358

**Figure 5.4 Type of investment needs for the development of Indonesian airports for the 2010–2014 period**

(Source: Carnis and Yuliawati 2013)

### 3. Institutional constrains.

The huge financial needed for developing airport infrastructure so far derived from governmental budget (APBN). Nevertheless, governmental budget (APBN) is not only concerning the development of airport. Education, health, and etc are also taken into account that causes the financial burden for developing airport. Another institutional constrains is the most airport in Indonesia is using together between Airport and Military Airbase (Joint-utilization). In order to develop, a permit is needed from the airport and military.

### 4. Resources

Developing airport in Indonesia involves many complex dimensions (building, supporting facilities, etc.). Specific skills and particular efforts is needed to make the airport running well.

## 5.5 Options for Privatization in Indonesia

Private sector participation is a new movement which becoming a trend in the world. Private sector is considered as a solution for the shortage of the government to fulfil the public welfare. But, how far the involvement of private sector is still remains a question. Based on the analytical framework that is been set up, this research tries to explore the possibility of implementation private sector participation in the airport.

### 1. Type of privatization/ownership

The increasing number of passenger is becoming the problem need to be solved. The growth must be balanced with the development of transportation infrastructure. The development requires huge funding to complete the planning of investment. In the end,

it will create a financial gap in transportation infrastructure. According to Carnis and Yuliawati (2013), transport infrastructure hold 29% of total financial needs and air transportation take 3.2% of total and 11% of transport investment. In period 2011-2014, US \$155 billion needed for economic investment and the financial gap is estimated at US \$44.14 billion or 28% of total amount of required investment.

As mentioned before, airports in Indonesia is owned and operated by government through DGAC and State Owned Enterprises (SOE). Those two parties are responsible for management and strategic direction of the airport. To cover up the financial gap, one of the way can be taken is involving private sector. However, there are some concerns emerging along with private sector involvement trends such as:

a. Reduction of control

By involving private sector, government control on airport will be diminished. The government had to share the power with private in decision making. They cannot impose the will anymore and have to consider private sector. Especially in Indonesia, participation of private sector can be interpreted as transfer ownership of hundred airports.

b. Decreasing of public revenue

As mention before, one of the functions of airport is place for business/ entrepreneurship. With the presence of private sector, there will be shared income obtained which lead to decreasing revenue for government.

c. Changing of objective from public welfare to maximize profit

By entering private sector in airport management, the fear about changing the aim of airport will appear. Different motive between the government and private could be the cause of changing the aim. The increasing cost is the impact from effort to maximize profit.

d. Environmental degradation

When the objective already changes to maximize profit, environmental becomes the last thing to consider. The more aircraft which take off and landing creates more air and noise pollution. The more people mean the more waste produce.

Although some doubts rising, the Indonesian government through Aviation Act 1/2009 stated that there will be some involvement of private sector in management and ownership. Yet, the role of private will be limited because the government stated that due to importance and strategic role of aviation on the general public livelihood. Moreover, in Government Regulation Number 13/2013, the involvement of private

sector in airport only limited until 49% of shareholder. From the portion, national shareholder must be larger than foreign shareholder.

This action is taken as a protection to national interest. If seen from the UK’s experience, it is also another form of retain “a golden share”. From the government perspective, both control of airport and financial for expansion could be gained. In contrary, the private sector is still allowed to involve in managing airport with the number of portions that have been determined.

Combining the explanation above with Neufville (1999), the possible implementation of privatization could be between ownership in government and management-strategic direction in government or private (Table 5.4).

**Table 5.4 Possibility Airport Management in Indonesia**

		Ownership	
		Government	Private
Management and Strategic Direction	Government		X
	Private		X

(Source: Author)

Furthermore, this relation between ownership and management and strategic direction will be described with Donnet et al (2013).

- 1. Government-Government
  - a. Government owned (GO).

This model is a model that has been applied now and can be continued. The government is holding full control for ownership and management through government bodies (technical operation units) (TOU/UPT) under supervision the Directorate General of Civil Aviation (DGCA). Another development from this model is cooperation with local government. The central government may involve the local government in managing airport.

- b. Government Owned Company (GOC).

State Owned Enterprises (SOE) could be the option in this model. In Indonesia, there are already two SOEs which control the airport. The government can gives the privilege to SOE in managing airport if the government still want to maintain control over airport with commercial way.

## 2. Government-Private

### a. Public Private Partnership (PPP).

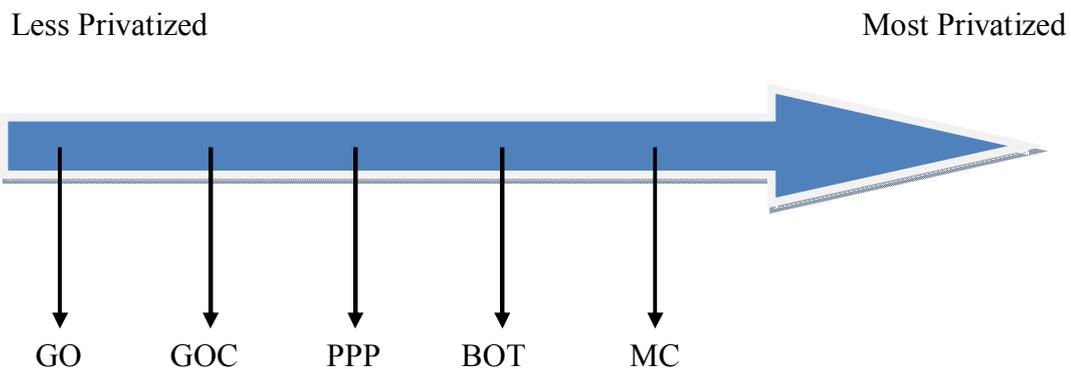
According to Edelenbos and Teisman (2008), Public Private Partnership “*is sustainable cooperation between public and private actors, who, from their own interests and perspectives, develop mutual products and/or services, and who share risks, costs, and benefits*”.

### b. Build Operated Transfer (BOT).

The government is giving the opportunity to private sector to finance and build a facility and also operated it (Betancor and Rendeiro, 1999). After several times (20-50 years), the private will give it over to government. During operated by private, the government will receive a concession from private sector.

### c. Management Contract.

The management of all or part of the airport is contracted with specialized operator (Betancor and Rendeiro, 1999). The operator will responsible for performance, maintenance and infrastructure investment.



**Figure 5.5 The Possible Model**

(Source: Author)

Although the full ownership of the airport was not considered by the Indonesian government, it might be the alternative path in managing airport in Indonesia in future. The UK’s example shows that the model is more commercially aware than public ones (Humphreys, 1999). Unfortunately, the possibility to carry out in Indonesia is very difficult. Regulations and laws need to reviewed and the perspective of all the different stakeholders needs to be taken into account. Changing regulations and laws in Indonesia is effortful compare to another country. This process will take more time,

cost and involve long bureaucratic procedures. Meanwhile, the need of financial and efficiency is urgent in order to develop the airport.

## 2. Institutional

Based on UK's experience, to carry out privatization properly required a strong institution to perform the rules. The entity acts as regulator in aviation business. In Indonesia, Directorate General Civil Aviation (DGAC) was appointed as body that handle aviation affairs. This body shall be performed several tasks such as ([hubud.dephub.go.id](http://hubud.dephub.go.id)):

1. *Preparing the formulation of policies of the Ministry of Transportation on the field of air transportation, airports, flight security, air navigation, aircraft airworthiness and operation;*
2. *Implementing policies on air transportation, airports, flight security, air navigation, aircraft airworthiness and operation;*
3. *Preparing standardization, norms, guidance, criteria, system and procedures for air transportation, airports, flight security, air navigation, aircraft airworthiness and operation;*
4. *Performing certification and/or licensing on air transportation, airports, flight security, air navigation, aircraft airworthiness and operation;*
5. *Supervising (in the sense of monitoring and assessment) the implementation of policies on air transportation, airports, flight security, air navigation, aircraft airworthiness and operation;*
6. *Controlling (in the sense of providing directives, guidance, technical guidance on the implementation of policies in air transportation, airports, flight security, air navigation, aircraft airworthiness and operation;*
7. *Law enforcement/corrective actions with respect to the implementation of policies in air transportation, airports, flight security, air navigation, aircraft airworthiness and operation;*
8. *Evaluating and reporting the implementation of policies in air transportation, airports, flight security, air navigation, aircraft airworthiness and operation;*
9. *Carrying out administrative affairs on the Directorate General of Civil Aviation*

Besides that, another institution overseeing the competition was also established. Derived from Act Number 5/1999 about Prohibition of Monopolistic Practices, an independent competition commission, *Komisi Pengawas Persaingan Usaha (KPPU)*, was set up. This commission aims is to prevent monopolistic practices and/or unfair

business competition by giving the same opportunity for all entrepreneurs. However, in the case of managing airport, the condition now is still under government monopoly, there is no private sector involvement yet. So it is hard to create the competition between airports. The geographical condition of Indonesia which consists of islands also became the barrier to generate competition. Different from the UK's experience, main airport separated 70 km between. Instead, the competition occurred in Indonesia is between other modes of transportation because the airport located in different island.

### 3. Performance

Until this moment, airport business in Indonesia is not attractive for investment. Airport industry is characterized with huge investment with low rate return and also long term. Angkasa Pura I, a state-owned enterprise which control airport in middle and eastern Indonesia, was reporting six airports under their management suffer a loss in 2012 (Tempo, 2013). Based on the UK's experience, diversification of business could be follow up. The entity that manages and operates the airport should think a creative business to support the main business. Aerotropolis, concept of urban design, infrastructure and economic centered on an airport, was chosen to develop Kuala Namu airport. Expected from this idea, it will generate investment for development surrounding areas. Another example of diversification that has been developed is airport boutique mall, combined mall in airport, in Sepinggan airport.

After the possibilities implementation of privatization recognized, the next step to do is making an arrangement to implement it. The realization steps of the privatization program describes below:

1. Because of several possibility raised, a study is needed by the government to carry out to determine the feasible privatization which suitable with the airport condition. Not all options can be implemented for every airport. It depends on in function, utilization, hierarchy and classification of the airports itself.
2. Based on the study, a report is presented and the government officials decided to continue the privatization. The government has to decide which airport can be privatized consider the large number of airport Indonesia owned.
3. Prerequisites of the proposed privatization must be set up.
4. The government seeks advice from a bank or financial institution regarding privatization.
5. Prepare the legislation and regulation considers the possibility of monopoly. An appropriate legislation and established regulatory are needed to be the guidance.
6. Initiate an advertising campaign to build the business's image.

7. Reviewing all plans for the sale and making changes if necessary.
8. Begin the privatization of airport.

### **5.6 Reflection**

Based on the UK's practice, not all type of privatization can be followed up. It has to fit with the Indonesian conditions. Regulation, institution and constrains become the part that has to be considered otherwise can delay the program. The most important that every actor who involved, either the central government, local government, private sector and the community, must have the willingness to success the program.

# CHAPTER 6 CONCLUSION AND RECOMMENDATION



H. AS HANANDJOEDDIN AIRPORT

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## **CHAPTER 6**

### **CONCLUSION AND RECOMMENDATION**

#### **6.1 Introduction**

This chapter will summarize the result of the research in order to provide the answer of research objective. First, it will describe about conclusion and next about recommendation for the case study. The reflection will be described in last parts.

#### **6.2 Conclusion**

Airport management in Indonesia, like any other developing country in the world, face many problems to deal with. The increasing number of passenger, in one side creates economic growth; in other side makes the infrastructure cannot provide a good service to passenger. In addition, it will jeopardize the safety and security in aviation business. It needs a new strategy to address the problem in airport management.

A new movement selected as a shift from the previous approach. The actors in planning have the same contribution for the change. The government, market and community are bounded in relationship which cannot separate. The government, which acts as a public, starts to involve market and community in planning. They began to realize how important of another sector in planning. Private sector participation seen as solution for the problem faced.

The notion of private sector participation also used in transportation infrastructure, especially in airport. Private sector participation means not only reducing the role of government but also in some cases transfer ownership to private sector. The government has to decrease their role because their inability to provide services to public. Private sector participation in a form of privatization now becomes new trends to respond the needs of funding and efficiency.

Involving private sector in policy life cycle is also the aims of privatization. Privatization could be implemented in many formats. Involvement is ranging from degree of the full government control until full private control. These kinds of shape have their own characteristics.

By conducting literature review, this research is discussed about the United Kingdom experience in airport privatization. The UK's is the first country implemented privatization. Three factors used in making assessment about privatization in UK. The first factor is type of privatization. Generally, based on the UK's experience, they develop many privatization forms for their airport; full private airport, part-private airport and public airport. From the

three shape, there is no single best model can be applied for general condition. The assumption that full private airport is the best choice fail to prove by the success story of Manchester airport. This public airport successfully transformed into fourth largest airport in UK. The airport also succeeds managing other airport in UK itself and also outside UK.

Second factor used in analytical framework is institutional. Strong willingness and supported by good regulation made the privatization running well. CAA acts as regulator and Competition Commission supervises the privatization to make sure competition between the airports. Third factor is performance. Diversification of business is needed to support the main business. Property, hotel and office, railway business are the example of activities which performed by the airport management to fund their operational cost beside depends on aviation charges.

Based on the UK's experience, this research tries to develop a model of privatization that appropriate with Indonesian condition. With the same analytical framework developed in the UK's case, the model for Indonesia arranged. Combining the context, regulation and the condition, it appears that the private ownership did not considered by the law. The Indonesian government still believes that airport hold a specific and special function. These characteristics made the airport must be under controlled by the government. However, the involvement of private sector is allowed in the portions of share.

The possibility of privatization in Indonesia is between the cooperation between government-government and government-private. For deeper explanation, government owned and government owned company are kind of government-government relationship. Furthermore, the interaction between government-private shall performed in PPP, BOT and management contract.

In the future, the full private ownership could be transformed to the alternative path in managing airport in Indonesia. Based on the UK's example, full private airport has more commercially aware than public ones. However, for performing this model is by means changing the regulations and laws. In Indonesia, changing the regulations and laws is difficult to do. It requires more time, cost and involve long bureaucratic procedures.

In order to support a new strategic in managing airport in Indonesia, regulation and supporting institutions must be prepared. This action is needed to protect national interest and to create competition between airports. The DGAC, as a regulator, should be able to run the rules correctly and firmly. Competition Commission must act fairly and equally in supervising the aviation business so that no aggrieved parties. But, several constrains become the hindrance to carry out. Not only that, diversification of business is should be established

to make the airport can compete with other airport. The airport cannot depend on only airport charges to support the maintenance and operation.

### **6.3 Recommendations**

Based on the result of the research above, I would like to give the recommendations for the selection of the privatization types that can be chosen in managing airport in Indonesia. These recommendations are expected to be one of the alternatives to improve airport management in Indonesia. The recommendations are made by the feasible lesson learned obtained from case study. The recommendations are follows:

1. Regarding the type of privatization, the easiest way to implement is based on the type which already regulated and not contrary to the prevailing regulation. According to explanation in Chapter 5, there are two options of partnership that matches the current condition of Indonesia and can be developed.
  - a. Government-Government
    1. Government owned.
    2. Government Owned Company (GOC).
  - b. Government-Private
    1. Public Private Partnership (PPP).
    2. Build Operated Transfer (BOT).
    3. Management Contract.

The hardest model to implement with the current condition is the full private ownership. Changing regulations and laws is needed in order to implement this model.

2. Regarding the institutional aspect, there is some need to strengthened institutional form. The DGAC, as a regulator, should be able to run the rules correctly and firmly. Competition Commission must act fairly and equally in supervising the aviation business so that no aggrieved parties. Strategic airport policy must be developed in order to guide the development, no matter which type of model selected.
3. Regarding diversification, it is good for business. But, non-airport business could be more subject to economic that the core airport business. The non-airport business may very potentially profitable, but more sensitive to fluctuations.
4. Several steps can be used to apply the privatization in practice:
  - a. Because of several possibility raised, a study is needed by the government to carry out to determine the feasible privatization which suitable with the airport condition. Not

all options can be implemented for every airport. It depends on in function, utilization, hierarchy and classification of the airports itself.

- b. Based on the study, a report is presented and the government officials decided to continue the privatization. The government has to decide which airport can be privatized consider the large number of airport Indonesia owned.
  - c. Prerequisites of the proposed privatization must be set up.
  - d. The government seeks advice from a bank or financial institution regarding privatization.
  - e. Prepare the legislation and regulation considers the possibility of monopoly. An appropriate legislation and established regulatory are needed to be the guidance.
  - f. Initiate an advertising campaign to build the business's image.
  - g. Reviewing all plans for the sale and making changes if necessary.
  - h. Begin the privatization of airport.
5. Considering the large number of Indonesia owned, further research is needed to determine a suitable match between the types of privatization with the existing condition of airport. Not all types of privatization in accordance with the conditions of the existing airport. Function, utilization, hierarchy and classification could be the factors affected.
6. Several main barriers could be faced and must be taken into account in order to make the privatization program work.

a. Institutional factors

The different expectation from the government and the private which not alignment can become the barrier. The purpose of the government to provide social welfare is sometimes contrary to the desire of the private sector. This lack of understanding can cause the failure of privatization. The framework of privatization itself is still weak and need some improvement. The regulation and legal framework also remain unclear.

b. Resources

Financial resources must be become priority because airport business is known as a business with low rate of return. It needs huge financial to invest in the airport because the supporting facilities such as terminal building, navigation aid, and security equipment are very expensive. Besides that, to run the airport, it will need skilled and trained human resources. To produce such kind of resources, more money and time is required.

#### **6.4 Reflection**

This research is based on the literature and secondary data to study and evaluate the factors defined. The components are going to be use as main information to present lesson learned for a country. However, this research conducted without direct survey or field study. Hence, it would be better for further research, the direct survey could be included so that the result can be more valid and it will be a good input for managing airport in Indonesia.

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## Reference:

- ACI – Europe (2010), The ownership of Europe's Airports, ACI- Europe, Brussels  
Airport System, Jakarta.
- Angkasa Pura 1, PT. (2009). Restructuring To Be World Class Airport Company. Annual Report 2009
- Angkasa Pura 2, PT. (2011). Restructuring. Annual Report 2011
- Angkasa Pura 2, PT. (2012). Aligning the Excellences for Excellent Future Menyelaraskan Keunggulan untuk Masa Depan Terbaik. Annual Report 2012
- Asian Development Bank Staff. (2001). Developing Best Practices for Promoting Private Sector Investment in Infrastructure: Airports. Asian Development Bank.
- Authority, C. A. (2011). UK Airports Market - General Context. Working paper. CAA, London, UK, September.
- BBC (2011). BAA told by Competition Commission to sell two airports. News Business: available at <http://www.bbc.co.uk/news/business-12903669>. Last accessed July 24, 2014.
- Bel, G., and Fageda, X. (2007). Airport management and airline competition in OECD Markets. In *Essays on Transport Economics* (pp. 159-181). Physica-Verlag HD.
- Betancor, O., and Rendeiro, R. (1999). *Regulating privatized infrastructures and airport services* (Vol. 2180). World Bank Publications..
- Brueckner, J. K. (2005). Internalization of airport congestion: A network analysis. *International Journal of Industrial Organization*, 23(7), 599-614.
- Bryman, A. (2012). Social research methods. Oxford university press.
- Budiono (2013). Panen Bandara di Seluruh Pelosok Nusantara : 14 pengembangan bandara komersial dan 11 bandara baru akan selesai antara 2013-2015, <http://wapresri.go.id/index/preview/berita/2541> last access in October 10, 2013 18:31 pm
- Busscher, T., Zuidema, C., Tillema, T., and Arts, J. (2013). Bridging gaps: governing conflicts between transport and environmental policies. *Environment and Planning A*, 46(3), 666-681.
- Camargo, L. M. (2013). Airport Privatization Movement in the 21st Century.

- Carnis, L., & Yuliawati, E. (2013). Nusantara: Between sky and earth could the PPP be the solution for Indonesian airport infrastructures?. *Case Studies on Transport Policy*, 1(1), 18-26.
- Cohen, J. P., and Coughlin, C. C. (2003). Congestion at airports: the economics of airport expansions. *Federal Reserve Bank of St. Louis Review*, 85(May/June 2003).
- De Neufville, R. (1999). Airport privatization: issues for the United States. *Transportation Research Record: Journal of the Transportation Research Board*, 1662(1), 24-31.
- Doganis, R. (1992). *The airport business*. Routledge.
- Donnet, T., Keast, R. L., & Walker, A. R. (2008). Fitting airport privatisation to purpose: aligning governance, time and management focus.
- Edelenbos, J., & Teisman, G. R. (2008). Public-private partnership: on the edge of project and process management. Insights from Dutch practice: the Sijtwende spatial development project. *Environment and planning. C, Government & policy*, 26(3), 614.
- Eisenhardt, K. M. (1989). Building theories from case study research. *Academy of management review*, 14(4), 532-550.
- Ernico, S. (2012). *Considering and Evaluating Airport Privatization (Vol. 66)*. Transportation Research Board.
- Gerring, J. (2004). What is a case study and what is it good for?. *American political science review*, 98(02), 341-354.
- Gillen, D. (2011). The evolution of airport ownership and governance. *Journal of Air Transport Management*, 17(1), 3-13.
- Government Regulation Number 13/2013
- Graham, A. (2012). ACRP report 66: considering and evaluating airport privatization (member of consultancy team).
- Graham, B., & Guyer, C. (2000). The role of regional airports and air services in the United Kingdom. *Journal of Transport Geography*, 8(4), 249-262.
- Hancock, B., Ockleford, E., & Windridge, K. (1998). *An introduction to qualitative research*. Nottingham: Trent focus group.
- Horonjeff, R., McKelvey, F. X., Sproule, W. J., Young, S., and Horonjeff, R. (1962). *Planning and design of airports*. McGraw-Hill.
- Humphreys, I. (1999). Privatisation and commercialisation: changes in UK airport ownership patterns. *Journal of Transport Geography*, 7(2), 121-134.

- Humphreys, I., Francis, G., & Fry, J. (2001). Lessons from airport privatization, commercialization, and regulation in the United Kingdom. *Transportation Research Record: Journal of the Transportation Research Board*, 1744(1), 9-16.
- Hussain, M. Z. (2010). *Investment in Air Transport Infrastructure*. Indonesian Aviation Act No.1 2009
- International Civil Aviation Organization Annex 14 (2004). : Aerodromes. Volume 1 Aerodrome Design and Operations.
- Ison, S., Francis, G., Humphreys, I., & Page, R. (2011). UK regional airport commercialisation and privatisation: 25years on. *Journal of Transport Geography*, 19(6), 1341-1349.
- Kapur, A. (1995). *Airport infrastructure: The emerging role of the private sector* (No. Technical Paper 313).
- Kim, K. S., and Dickey, J. (2006). Role of urban governance in the process of bus system reform in Seoul. *Habitat International*, 30(4), 1035-1046.
- Levine, M. E. (2009). Airport Congestion: When Theory Meets Reality. *Yale Journal on Regulation*, 26 (1).
- Martin, S., & Parker, D. (2003). *The Impact of Privatization: Ownership and Corporate Performance in the United Kingdom*. Routledge.
- Miller, A. N. (1994). Privatization: lessons from the British experience. *Long Range Planning*, 27(6), 125-136.
- Ministry of Transportation Regulation Number 69/2013
- Ministry of Transportation, Indonesia, (2013). *Ministry Regulation on the National*
- Oum, T. H., Adler, N., & Yu, C. (2006). Privatization, corporatization, ownership forms and their effects on the performance of the world's major airports. *Journal of Air Transport Management*, 12(3), 109-121.
- Padova, A. (2007), *Airport Governance Reform in Canada and Abroad*, (WWW) document,<http://www.parl.gc.ca/content/LOP/ResearchPublications/prb0712-e.pdf> accessed on 22nd January , 2013)
- Payson, W. H., and Steckler, S. A. (1992). *Expanding airport capacity: getting privatization off the ground* (Policy Insight No. 141).
- Putri, A. (2013). *Enam Bandara Angkasa Pura I Merugi*. *Tempo Bisnis*: available at <http://www.tempo.co/read/news/2013/03/04/090465069/Enam-Bandara-Angkasa-Pura-I-Merugi>. Last accessed June 29, 2104

- Reimer, D. S., and Putnam, J. E. (2009). Airport Governance and Ownership. ACRP Legal Research Digest, (7).
- Salter, M. B. (Ed.). (2008). *Politics at the Airport*. U of Minnesota Press.
- Starkie, D. (2008). The airport industry in a competitive environment: A United Kingdom perspective (No. 2008/15). OECD Publishing.
- Stoker, G. (1998). Public-private partnerships in urban governance. In J. Pierre (Ed.), *Partnerships in urban governance—European and American experience* (pp. 34–51). London: Macmillan
- Transportation Statistic. (2012). Ministry of Transportation Indonesia, Jakarta
- Truitt, L. J., & Esler, M. (1996). Airport privatization. *Policy Studies Journal*, 24(1), 100-110.
- Van der Heijden, R. E. (1996). Planning large infrastructure projects: seeking a new balance between engineering and societal support. *disP-The Planning Review*, 32(125), 18-25.