CHAPTER III THE DEVELOPMENT OF CHINA AND NORTH KOREA MILITARY CAPABILITY

In understanding the development of the defense of China and North Korea further, so here the author would like to explain each history of military development in China and North Korea so that we can see clearly the military transformation and the shifting of China and North Korea. After understanding the development of the China and North Korea military by the history which accompanied them, in this next sub-chapter the author would like to inform the increasing of the military capability of China and North Korea by looking at 2 indicators which are the military power, and the military technology.

The increasing of the military capability in these both countries has improved a lot especially in facing the regional security issue. Some of the security issues influence the military development in China and North Korea besides to maintain their sovereignty, it is also to be a prevention form toward the external threat. However, their military developments continued to expand into the next periods. These changes in China and North Korea defense postures will be used later to analyze the respond of Japan, particularly under Shinzo Abe as a neighbor state.

A. Military Development of China

1. The History of China's Military Development

The development of modern Chinese defense thought began in 1930's and 1940's which more focusing on 2 strategies component which is in territorial defense and coastal defense. In that time, China's defense essential was such as which contained in the doctrine of People's War, which implicitly the People's War relied upon the human element, and guerrilla warfare, even in the concept of Mao Zedong, this guerrilla warfare itself which become the main of the defense strategy. Therefore, until at the beginning of 1980's, the

coastal defense strategy was only becoming a second component in the national defense strategy of China. However, the defense strategy of China was as a necessary to prevent the threat such as to block the enemies in the border (Fravel, 2007).

China transformed itself into a new world power which has a "hard power" or a big military and economic power lastly. China has experienced a rapid progress in economic aspect. Almost all of China's products spread in the whole world. However, China's economic rising was begun when Den Xiaoping started to unleash the shackles of the national economy in 1979. In that time, Deng met Jimmy Carter, US President. The goal of Deng was China which rich, modern, strong, and he also wanted to open the door to new relationships by build relations with the Western countries. Deng also left a lot of communist orthodox doctrines and try to combine the elements of the free trade system into China's economy. According to Deng, China might come out of the Maoist state control where the entrepreneurial spirit in China should continue to be advanced (S.G.Goodman, 1994). In addition, some of the capitalist characters and necessary changes must be openly accepted by China irrespective of any political impact that will occur.

At the beginning of 1980's, China implemented the active defense strategy (*jiji fangyu*) which similar with the effort of the economic development which was arranged by Deng Xiaoping (Finkelstein, 2013). Therefore, the defense policy of China should be subordinated to support the national economic development. Overall, the active defense doctrine was meant to facing 3 kinds of wars which is the world war, the widespread war in facing foreign country aggression against China, and limited border or war conflicts, and the conflicted border. From the 3 possibilities war, since in the middle of 1980's, Chinese strategic elite believed that third kind of war would happen. So that, up to this day some of the regional strategy war simulations (*youxian zhubu zhanzheng*) always be developed by China (Finkelstein, 2013).

In implementing the capitalist, Deng relaxed the existing economic controls in China and opened the form of a potential free trade of an economic liberalization that finally led to the Chinese people to leaving the poverty in just a few decades. The growth of the global economy in China could be proven by the advancement of the technology, the number of the export factories, investment, the increasing of the trade surplus with the US, and the offer of acquisitions for American companies by China. Meanwhile, the success of China was not obtained instantly. The success has been pioneered by the Chinese government for a long time. However, the economic growth becomes one of the driving factors toward China in increasing the military power (Cordesman, Chinese Strategy and Military Modernization in 2015: A Comparative Analysis, 2015).

China's defense strategy began to account the important meaning of the maritime and air defense within the active defense doctrine. This defense strategy restructured the development of the priority of the armed forces in the three forces of the air, sea, and land in order to build the rapid response capability in facing the regional war or the low-intensity conflicts around the China region. Meanwhile, at the beginning of 1990's, the active defense doctrine continued to be revised, explicitly, the armed forces of China set the priority development in navy and air forces (Fravel, 2007).

In addition, China also had been experiencing the significant transformation in the global and regional security diplomacy in the middle of 1990's. After the Cold War, the leader of China, Yang Shangkun, began to arrange the policies which focus on the future of its security and the welfare which has aimed to rebuild the cooperation with other states in Asia (Directorate of Intelligence, 1987).

Meanwhile, during the Cold War, China was only focusing on how its national security can survive among the 2 hegemony power rivals, how China can fight one of these great powers or even both together with its allies. China's government perspective was "Military power is the most

important support in the mission of defending the territorial sovereignty and the integrity of a country, against the aggression of foreign nations and maintaining the integrity of the state" (Ministry of National Defense of the People's Republic of China, 2013)

So that, China thought that it is important to develop its strong military capability to achieve that mission. Beside it, there are a lot of the potential conflicts that will happen in East Asia especially in the territory dispute such as the conflict with Vietnam toward Paracel Island in the South China Sea, and also the conflict dispute with Japan in Senkaku Island, which become the proof toward China to strengthening the defending system. However, the military force is encouraged to increase the military operational ability which is combined with the high weapon technology. This doctrine of military-quality modernization became a philosophy which underlies the military development of China since 1992 up to this day (Ministry of National Defense of the People's Republic of China, 2013).

2. The Increasing of China's Military Capability

Military capability is the ability of the military power of the state which can be used to have an operation in order to fulfill the state interest which related or even face the threat. The increasing of the military capability of the state can be used as a benchmark of the extent to which a country increases its military power.

In order to measure the military capability of the state, according to Stephen Biddle in his book Military Power: Explaining Victory and Defeat in Modern Battle (2004) can be measured by 2 ways, which are by seeing the amount of the military power, and the indicator of military technology. Therefore, in this subchapter, the author will inform Chinese military capability by 2 ways.

a. Military Power

The establishment of People's Liberation Army (PLA) history as China's military was as old as the history of China itself, because of that, traditional

thoughts much affect the behavior and the basic thought of its military up to this day. The modernization which currently is implemented will be more focus on the quantity principle, which can be proven by the effort of China in buying the newest technology of army This modernization emerged from the weapons. nationalism of China which has the main goal to achieve the superpower status and the regional supremacy. In order to achieve these goals, China needs a strong military power and need to be respected by other states. One thing that needs to be struggled by China is PLA must be a balancing power which can guarantee the development of China in the future. Meanwhile, PLA had been developed rapidly which continued to be as one of the strongest military forces in the world.

is underlying to China its public emphasizing on peaceful intentions and defensive national defense modernization in its the White Paper, and it describes the actions by this statement in its White Paper, as policies follows:

With the development of national economy and society, the increase of China's defense expenditure has been kept at a reasonable and appropriate level.... in recent years, the share of China's annual defense expenditure in its GDP has remained relatively steady, while that in overall state financial has been moderately decreased (China's White Paper, 2011).

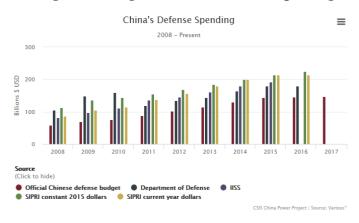


Figure 3.1 Diagram of China Defense Spending

Sources: (Center For Strategic International Studies, 2017)

According to the diagram Official figures released by the Chinese government, China in 2016 was spending its defense budget as much as 954 billion Yuan (\$146.6 billion), and the defense budget was increasing as much as 7.6 percent from the 2015 budget of 887 billion Yuan (\$144.2 billion), and lastly in 2017 the data of the military budget in China is \$148.3 billion (Center For Strategic International Studies, 2017). However, the data show that Chinese defense spending is on the rise and China currently spends more on its military than any other country in the world save the United States (Center For Strategic International Studies, 2017).

The newest data also argued that in the upcoming years, Chinese military budget will always significantly increase. Almost every year, China increases its percentage of weapons budget in double digits, which means that increasing is always up to 10%. By the fact of its increasing budget, it emerges some negative

perception to some states in the Asia Pacific such as Japan, which is the judging of China's tendency to become a superpower country in the Asia Pacific.

b. Military Technology

After that, the thing that can be an indicator in seeing the increase of Chinese military capability is about the military technology which is owned by China. In the defense technology, China is a state which has advanced defense technology. Here the author describes some of the military technology advancement which is owned by China.

• PLA Ground Force (PLAGF)

The main role of PLAGF is in defensive aim which is to maintain and secure the region. With a total of about 1.6 million personnel and divided into 18 groups each of them have power around 30,000 to 65,000 personnel (Amy Chang, 2012). Modernization of the weapons system in PLAGF was be done by having a combination between the removing old weapons and change in a modern weapon with the newest information technology.

The PLAGF became the first military force to operate laser dazzle device systems compared to other countries' military forces, and has been installed on two of its latest MBT series Type-98 and Type-99 which in the third generation MBT, PLAGF also has second-generation MBT fleets of Type 90-II, Type 85-III, Type 85-II, Type-80 (Cordesman, Chinese Strategy and Military Modernization in 2015: A Comparative Analysis, 2015). Then the first generation MBT which was originally supplied from Russia is Type-79, Type-69, and Type-59, as well as three variants of Light Tanks, Type 005 AAAV ZTD which amounted to more than 800, Type-62 which

amounted to 200 and Type-63A, amounted to 400 (Sharma, 2010).

Other armaments are Infantry Combat Vehicles (ICVs) or infantry combat vehicles. The most modern and famous series are ZBD-97, ZBL-09, ZTS-04, and ZBD-04 which is the most powerful amphibious series ever deployed by PLAGF. There are also Type YW307 and Type YW309 series, and then the most powerful variant is NORINCO VP1 equipped with the nuclear system, Biological and Chemical Reconnaissance (NBC) (Sharma, 2010).

• PLA Navy (PLAN)

The PLAN is China's main force for maritime operations which has a responsibility for tasks in maintaining the security of China's maritime and maintaining the sovereignty of the territorial sea.

China has begun operating aircraft carriers to support its strength in protecting its waters. The former Soviet naval ship Varyag weighing 67,500 tons bought in 1998 from Ukraine in 2012 the aircraft carrier was renamed Liaoning Shi Lang (SinoDefence, 2017). In addition, China has produced a new class of nuclear-powered ballistic missile submarine (SSBN) submarines. JIN-class SSBN or known as Type-094 which is a ballistic missile launcher. Beside it, there is also nuclearpowered attack submarines (SSN) nuclear power which is the second generation of SHANG-class (Type-093) SSNs. Since 2011 PLAN has also begun the production of a new frigate called the Type 056 equipped with a more sophisticated weapon and radar system to replace some of the old class fleet (Cordesman, Chinese Strategy and Military Modernization in 2015: A Comparative Analysis, 2015).

• PLA Air Force (PLAAF)

PLAAF has a role to carry out air operations, which are responsible for tasks such as maintaining airspace of territory and territorial sovereignty, as well as maintaining the posture of national air defense stability. PLAAF has weapons such as aviation, surface-to-air missiles and anti-aircraft artillery, radar, and airborne, as well as other special units.

The increase in PLAAF offensive capability is further evidenced by the growing number of third and fourth generation fighter aircraft, Airborne Early Warning (AEW) or early warning aircraft that have a radar system to detect other aircraft, fuel filler tankers, intelligence collection and jamming aircraft, and anti-aircraft missile systems (Amy Chang, 2012).

• PLA Second Artillery Corps (PLASAC)

PLA Second Artillery Corps (PLASAC) or PLA Second Artillery Force is a new army in addition to the army, air, and sea, operating the Chinese nuclear weapon system. In 2007-2008 PLASAC introduced ground-launched land attack cruise missile that is CJ-10. In 2008 for the first time, PLASAC lowered the Theater-Range Ballistic Missiles (TBM), the DF-21C, which reached 1,087 miles (Cordesman, CSIS (Center for Strategic & International Studies), 2016).

In 2010 China deployed the world's first antipapal ballistic missile with a range of more than 932 miles, the DF-21D. In 2010 China operated the largest and most deadly short-range missile in the world, then deployed the world's first anti-aircraft missile. Then in 2012, China began to deploy its first long-range missile, a cruise missile for the ground attack launched from fighter aircraft, and widely deployed anti-

ship long-range missiles launched from submarines (Cordesman, CSIS (Center for Strategic & International Studies), 2016).

B. Military Development of North Korea

1. The History of North Korea's Military Development

Japan colonialism in Korea in Meiji Restoration had an initiative in separating Korea from Qing Dynasty and made Korea as a Japanese Satellite in order to advance the security and national interest of Japan (Duus, 1995). Japan colonialism was begun since July 1905. During Japan colonialism, some effort to build the industries and infrastructure was contracted in Northern Korea. Because of Northern Korea have relatively larger natural resources than in Southern Korea. As the result, 65% of Korea Peninsula region which has heavy industrial facilities and infrastructure was located in Northern Korea, while in Southern of Korea Peninsula was more focusing in the agriculture and population (Hubbard, 2001).

During Japanese rule in Korea, knowledge about the technology started to be introduced. Starting from the transportation infrastructure in Korea such as harbor facilities build and railway system. At the end of 1920's until 1930's, in the Kazushige Ugaki's governor, Korea was more constructed to build an industrialization center. Then it was built some heavy industries Centre, such as chemical industry and steel milling industry. Moreover, Japan's military thought that those industries would give some profit to them. So, it can be seen that the military industry center in that time was located in Northern Korea. And it can be concluded also that the weapon technology of Northern Korea was more advanced than the weapon technology in Southern Korea. Inherited knowledge and technology of Japanese weapons which centered in Northern Korea was the root of the history why the weapon industry in North Korea is more advance firstly than South Korea (Pratt, 2007).

In 1945, Japan colonialism ended and Japan surrendered to the allies which marked by the bombs in Japan. Japan surrender to the allies was followed by Japanese disarmament by US and USSR. The occupation of both superpower states in Korea Peninsula created a strategic agreement which was a division of the territory of Korean region become 2 sides. Every side of Korea was ruled by one of those superpower states and it might build based on their ideologies. So that, it created different ideologies and government system, which is North Korea was ruled by USSR in communist socialist ideology and South Korea was created by the US which more liberal.

2. The Increasing of North Korea's Military Capability in Nuclear Weapon

In the beginning, the weapon technology of North Korea was obtained in Japan colonialism while Japan centered the military industry in Northern Korea. In its development, North Korea developed the uranium mining and estimated to have high explosive power. In 1952, Atomic Research Institute was firstly built in North Korea. The existence of the North Korean interest in the nuclear weapon was influenced by their first leader Kim Il Sung. The ability of North Korean nuclear weapon began to be developed in 1956 by USSR assistance. In the middle of 1960's, North Korea built a research complex of atom energy on large scale in Yongbyon and also practicing some of the specialists of the student which been studying in USSR. After that, USSR and North Korea also signed a cooperation agreement in 1956. USSR also helped in providing the reactor assistance for the research which called by IRT-2M.

In 1970's, the center of North Korean nuclear research focused on the rotation of nuclear fuel. Beside it, North Korea also began to build a research reactor which called 5 MWe as a second reactor which after that made the condition in Korea Peninsula in a tension. Nuclear weapon program of North Korea has begun again in 1980's and respectively had some detonation test which has a high explosive.

In fact, the capability of the conventional military in North Korea still can be said weakly. It can be seen by the existence of the old tank which is owned by North Korea such as T-54/55/59s, T-26, and T-34s. Beside it, the static of air defense system such as the pilot in North Korea could only practice less than 50,000 hours in a year. The inability of North Korea in increasing the combat capability is caused by the poor economic condition. By having a nuclear weapon, North Korea attempt to fulfill the weakness of their conventional weapon capabilities.

a. Military Technology

Another indicator is by looking at the increasing of military capability in North Korea which is the military technology. In the defense technology aspect, North Korea is one of the states which have an advance in the nuclear weapon. Nuclear development program in North Korea is plutonium-based nuclear and highly enriched uranium (Pratt, 2007). North Korea has some of the nuclear facilities which potentially to produce the nuclear weapon. North Korea has several missile weapons with varying capabilities and range:

Table 3.1 Missile Weapons Technology of North Korea

Missile	Distance	Information
Name	Coverage	
Toksa	120 km	- The shortest missile of North Korea
Scud Type	300 km - 500 km	 Scud missile type is Hwasong-5 and Hwasong 6 This missile can bring hard materials and high explosive power, chemical

		and biological weapons and cluster
Nodong Type	1000 km - 1,300 km (can coverage South Korea region and half of Japan region)	 This missile was developed by a scud missile type This missile was released in 1998
Taepodong Type 1	1,500 km	- Using liquid fuel - This missile can bring heavy warhead as 1,000 0 1,500 kg
Musudan	2,500 - 4,000 km (can cover a whole of Japan region)	- This missile is a new type of Intermediate Range Ballistic Missile
Taepodong Type 2	6,000 – 10,000 km (distance coverage has not been perfect yet)	- This missile can bring heavy warhead as 1,000 0 1,500 kg
KN08		- This missile is an intercontinental ballistic missile
Submarine- Launched Ballistic Missile (SLBM)		- A new submarine which has announced on May 2015

Sources: (Departement of Defense USA, 2016)

From the table above, we can see that North Korea had been successful in producing some of the missile weapons. Based on some data, while North Korea continued produced the missile weapons, North

Korea also has a nuclear weapons testing, which absolutely the nuclear testing can be dangerous to be done in a region. Moreover, by looking at the distance that can be reached by North Korean missile weapon.

Figure 3.2 Diagram of Key North Korean Missiles

Source: (BBC News, 2017)

However, the nuclear weapon test that was done by North Korea had been done starting from 1993 until 2016 for six times and four times is a test of nuclear weapons tests, starting from 2006, 2013 and 2016. North Korea also has two weapons testing sites including nuclear weapons testing sites at Youngdoktong and Punggye-Ri while the other three as ballistic missile tests are in Yong-jo Ri, Sangnam Ri, and Musudan-Ri (BBC News, 2017).