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Nine Questions of India's Nuclear Strategy:

Implications for Japan-India Relations

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Abstract

In 2014, during the election campaign in India, the party BJP published their manifesto and showed their will to revise the nuclear doctrine which was published in 2003. However, later, BJP chief Rajnath Singh told that they did not intend to reverse the 'no first use' policy for nuclear weapons. If so, which parts will be changed by the new Narendra Modi led BJP government? What kind of problem India is facing? And now that Japan is negotiating with India civil nuclear cooperation agreement, what would be the kind of implications for Japan-India relations? Because Japan, India and China will be three powerful pillars to decide order in Asia in the near future, Japan-India cooperation will affect the entire Asian security structure. Therefore, in this article, I try to critically analyze the nine questions which India's nuclear strategy needs to answer.

- (1) How to deter China's aggressiveness?
- (2) How India deters Pakistan to use their nuclear weapon in their soil?
- (3) How to deter Pakistan from using tactical nuclear weapons?
- (4) Will India retaliate with nuclear weapons in the event of attack by biological or chemical weapons?
- (5) Is there enough military advice in the nuclear command?
- (6) Where is missile defence system in India's nuclear strategy?
- (7) By whom and how to command strategic submarines and bombers?
- (8) Are there enough explosions to maintain the nuclear capability of India?
- (9) Will Indiajoin NPT or CTBT?

In any cases, while they monitor China and other countries, Modi government will update their nuclear doctrine, carefully. This means that India has initiative to decide how to promote Japan-India civil nuclear cooperation.

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lssue No. 277 June 2014

ANALYSIS

In 2014, during the election campaign in India, the party BJP published their manifesto and showed their will to revise the nuclear doctrine which was published in 2003 under the Atal Bihari Vajpayee led BJP based coalition government.¹ Later, BJP chief Rajnath Singh told that they did not intend to reverse the 'no first use' policy for nuclear weapons.² If so, which parts will be changed by the newly elected Narendra Modi led BJP government? What kind of problem India is facing today? And now, as Japan is negotiating with India civil nuclear cooperation agreement, what would be the kind of implications for Japan-India relations? Because Japan, India and China will be three powerful pillars to decide order in Asia in the near future, Japan-India cooperation will affect the entire Asian security structure.³ Therefore, in this article, I try to critically analyze nine questions which India's nuclear strategy needs to answer. After presenting these nine questions, I will analyze their implication for Japan-India relations (in this article, "India's nuclear strategy" means the whole of India's strategy related with nuclear weapons including "nuclear doctrine").

Contents of India's Nuclear Doctrine 1.

To begin with the issue, we should remember the contents of India's nuclear doctrine. According to the Indian government, the contents of this nuclear doctrine are as below.⁴

- (1) Building and maintaining a credible minimum deterrent;
- (2) A posture of "No First Use" nuclear weapons will only be used in retaliation against a nuclear attack on Indian territory or on Indian forces anywhere;
- (3) Nuclear retaliation to a first strike will be massive and designed to inflict unacceptable damage;
- (4) Nuclear retaliatory attacks can only be authorised by the civilian political leadership through the Nuclear Command Authority;
- (5) Non-use of nuclear weapons against non-nuclear weapon states;
- (6) However, in the event of a major attack against India, or Indian forces anywhere, by biological or chemical weapons, India will retain the option of retaliating with nuclear weapons;
- (7) A continuance of strict controls on export of nuclear and missile related materials and technologies, participation in the Fissile Material Cutoff Treaty negotiations, and continued observance of the moratorium on nuclear tests;

² Kumar Uttam, "No-first-use nuclear policy to stay: Rajnath" (Hindustan Times, April 14, 2014) Web source:

Web source: http://pib.nic.in/archieve/lreleng/lyr2003/rjan2003/04012003/r040120033.html (accessed on 15 June 2014).

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¹ BJP. "Election Manifesto 2014"

Web source: http://bjpelectionmanifesto.com/ (accessed on 15 June 2014).

http://www.hindustantimes.com/elections2014/election-beat/no-first-use-nuclear-policy-to-stay-rajnath/article1-1207761.aspx (accessed on 22 June 2014).

Satoru Nagao, "India's Military Modernization and the Changing US-China Pow er Balance", Asia Pacific Bulletin, No. 192 (East West Center, December 2012)

Web source: http://www.eastwestcenter.org/publications/india%E2%80%99s-military-modernization-and-the-changing-uschina-pow er-balance (accessed on 22 June 2014). ⁴ Prime Minister's Office, Government of India, "Cabinet Committee on Security Reviews Progress in India's Nuclear Doctrine",

⁽Press Information Bureau, 4th January 2003)



lssue No. 277 June 2014

(8) Continued commitment to the goal of a nuclear weapon free world, through global, verifiable and nondiscriminatory nuclear disarmament.

2. Nine Questions

To ponder upon nuclear deterrence, we need simulation for a likely case lest India use nuclear weapons despite few real possibilities for such occurrences. When we simulate how India might use nuclear weapons, there are at least nine questions as listed below.

(1) The first question: How to deter China's aggressiveness?

The first question is a very simple question. How to deter China's conventional armed forces even when India does not possess enough conventional military power to deter? Nowadays, in Indo-China border area, as a result of China deploying new fighters, missiles and modernizing military related infrastructure, the military balance between India and China is changing. Within 48 hours, Chinese armed forces can be ready for battle in the border area whereas India needs one week for preparation as there are not enough roads on the Indian side.⁵ Within 30 days, China is capable of moving around 30 divisions (each with over 15,000 soldiers) to the border. This means that India could land in a dangerous situation of facing more than three times bigger Chinese forces in the border area after China finish their massive infrastructure development.⁶

In the air, the situation is similar. In 2009, Air Chief Marshal P V Naik had accepted that India's "aircraft strength is inadequate and is just one third of China's air force".⁷ At the same time, in the Indian Ocean, China had started a two months extended patrol by using nuclear attack submarines from 13 Dec 2013 to 12 Feb 2014. This is not a surprise because in 2012, at least 22 contacts were recorded with vessels suspected to be Chinese nuclear attack submarines patrolling in the Indian Ocean region. The problem that arises here is that if China deploy strategic nuclear missile submarines in the Indian Ocean in the future, how to deal with that situation?

Thus, to have enough military force to deter China's invasion, there is a possibility that India should fill the gap of conventional military power of two countries by using nuclear weapons. However, the nuclear doctrine declared that India will not use nuclear weapons without enemy attacking India by using nuclear weapon. If so, in the view from traditional deterrence theory, how will India keep the military balance to deter China's modernized conventional forces?

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⁵ Deeptiman Tiw ary, "Chinese clearing forest cover to grab border land" (The Times of India, August 26, 2013) *Web source*:

http://articles.timesofindia.indiatimes.com/2013-08-26/india/41453967 1 chinese-troops-incursion-sino-indian-border (accessed on 15 June 2014). ⁶ Rajat Pandit, "India boring border tunnels to take on China, Pakistan" (The Times of India, 16 August, 2012)

⁶ Rajat Pandit, "India boring border tunnels to take on China, Pakistan" (The Times of India, 16 August, 2012) Web source:

http://articles.timesofindia.indiatimes.com/2012-08-16/india/33232484_1_tunnels-rangpo-sikkim (accessed on 15 June 2014). ⁷ "IAF strength just one-third of China's: IAF chieff" (The Times of India, 24 September 2009)

Web source: http://articles.timesofindia.indiatimes.com/2009-09-24/india/28089794_1_iaf-aircraft-strength-air-chief-marshal (accessed on 15 June 2014).



lssue No. 277 June 2014

(2) The second question: How India deters Pakistan to use their nuclear weapon in their soil?

Second question is related with Pakistan. To simulate Indo-Pakistan total war, there is a possibility that India cannot use nuclear weapon despite Pakistan doing so.

This simulation is related with Sundarji doctrine which India has pursued since 1981. And because Indian Army has still kept this position under the doctrine, the simulation under the Sundarji doctrine is still important as traditional deterrence. Under the doctrine, in the time of war with Pakistan, India's Holding Corps which consist of infantry divisions stop attack of Pakistan's offensive and India's three Strike Corps which consist of tank divisions prepare to attack. And finally, these Strike Corps go deep into Pakistan territory and cut Pakistan into two.

When India's strong armed forces enter deep into Pakistan territories, there is a possibility that Pakistan use nuclear weapons in their soil to destroy India's Strike Corps. In this case, where should India attack by using nuclear weapon as retaliation? If India cannot retaliate by using nuclear weapons, how to deter Pakistan use of nuclear weapons?

(3) The third question: How to deter Pakistan from using tactical nuclear weapons?

Third case is related with the limited war with Pakistan. After the attack on Parliament and Operation Parakram in 2001-2, India has started to research a new doctrine which is called by researchers as Cold Start Doctrine. Under this doctrine, if Pakistan sponsored terrorists attack India, India will commence limited military operation against Pakistan and occupy some area which is important but not too vital for Pakistan. The planners of this doctrine thought that Pakistan cannot use nuclear weapon because these areas are not too vital for survival. If Pakistan thinks that the supporting terrorists will not gain because the terrorist attack is likely to lead to India's military attack, this doctrine will be effective as deterrence.

However, to counter the doctrine, Pakistan has started to research tactical nuclear weapons (smaller version of nuclear weapons).⁸ Now, Indian needs an idea about how to deter Pakistan's use of tactical nuclear weapons.

(4) The fourth question: Will India retaliate with nuclear weapons in the event of attack by biological or chemical weapons?

According to the nuclear doctrine, "In the event of a major attack against India, or Indian forces anywhere, by biological or chemical weapons, India will retain the option of retaliating with nuclear weapons". However, in the same nuclear doctrine there is further mention of "A posture of "No First Use" under which nuclear weapons will only be used in retaliation against a nuclear attack on Indian territory or on Indian forces anywhere". Because in the event of attack by biological or chemical weapons are not nuclear attack, India cannot retaliate with nuclear weapon without abandoning the "No First Use" policy.

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⁸ Because tactical nuclear w eapons are smaller version of nuclear w eapons, there is a possibility that Pakistan use these w eapons despite India's offensive operation is not vital for Pakistan to survive.



lssue No. 277 June 2014

(5) The fifth question: Is there enough military advice in the nuclear command?

The fifth question is related with command chain. In India, the Nuclear Command Authority comprises a Political Council and the Executive Council. "The Executive Council will provide inputs for decision and executes the directives given to it by the Political Council".⁹ In the Political Council which is chaired by the Prime Minister, there is National Security Advisor as a member but no military officer. In Executive Council which is chaired by the National Security Advisor, there is military officer as a member. Thus, the chain of command, National Security Advisor is the only person to connect both Prime Minister and military officers, directly. Will Prime minister get enough military related information to decide how to use nuclear weapons?

(6) The sixth question: Where is missile defence system in India's nuclear strategy?

After the Kargil war, India started a new strategic weapon which is missile defence system. Prithvi Air Defence (PAD), Advanced Air Defence (AAD), Prithvi based PDV and High Power Laser Direct Energy Weapon (HPL-DEW) etc. Despite that these weapons can protect only a very limited area, such kind of defensive weapons are very important for India's nuclear strategy.

For example, if the enemy state cannot destroy India's nuclear command authorities by nuclear missiles because the authorities are protected by missile defence system, the situation will dissuade the enemy state to use nuclear weapons.

In addition, these weapons are effective to deal with the situation of terrorist use of ballistic nuclear missiles. In 2014, because NATO forces will withdraw from Afghanistan, there are some concerns about re-rising of Taliban and other terrorists based on Muslim extremism like Al-Qaeda not only in Afghanistan but also Pakistan. If Pakistan will be failed state, there is a possibility that Taliban or terrorists will occupy nuclear missile base in Pakistan. Under such situation, India needs to be prepared to deal with terrorists who may launch a nuclear missile against India. Because the number of missiles which terrorists can fire is limited, there is a possibility that missile defence system can protect the capital or important areas by intercepting all missiles.

However, when these kinds of weapons are operational, who will command these weapons? It is easy to guess that Strategic Force Command under the Nuclear Command Authority will command strategic missile system. But missile defence systems are not only used for strategic purpose, but also tactical purpose. For example, in the near future, India needs ballistic missile defence system for their naval fleets because China is developing anti-ship ballistic missiles. India will need to decide who will command these systems.

(7) The seventh question: By whom and how to command strategic submarines and bombers?

Strategic Force Command controls land based ballistic missiles like Agni and Prithvi series, but not fighters like Su-30, Mirage 2000 and Jaguars which carry nuclear weapons as bombers. Despite that the Strategic Force Command requested to control 40 fighters, they have not received the permission because these fighters have other tactical duties too.¹⁰ Thus who will command these fighters remains an unresolved problem.

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⁹ Prime Minister's Office, Government of India, "Cabinet Committee on Security Review's Progress in India's Nuclear Doctrine", (Press Information Bureau, 4th January 2003)

Web source: http://pib.nic.in/archieve/lreleng/lyr2003/rjan2003/04012003/r040120033.html (accessed on 15 June 2014). ¹⁰ "Strategic Command to acquire 40 nuclear capable fighters" (Hindustan Times, 12 September 2010)



lssue No. 277 June 2014

India will possess Arihant class nuclear submarines in the near future. To operate these strategic missile submarines, some attack submarines are needed to escort the strategic missile submarines. Thus, like fighters' case, who will command these submarines will be a problem because these weapons have other tactical duties.

But in this case, there is another problem, too. These nuclear submarines can remain undetected underwater and move towards the location for weeks. This means that there is a possibility that the crew of these submarines will face the situation in which they cannot contact with any Nuclear Command Authority, Strategic Force Command and Navy. If submarines list contacts with Nuclear Command Authority caused by enemy's nuclear strike, the submarines have the duty of retaliation. Thus, Nuclear command Authority must keep contact with these submarines.

Since 2013, India has operated a new communication satellite for Navy. This GSAT-7 can provide coverage for over 600,000 square nautical miles of the Indian Ocean. But in war or conflict, there is a possibility that the enemy will attack the satellites. This means that these submarines will lose contact with command authorities suddenly. India needs to decide the rule for who will take responsibilities about nuclear weapons when submarines lose contact with command authorities.

(8) The eighth question: Are there enough explosions to maintain the nuclear capability of India?

The eighth question is related with credibility. India has already had one explosion in 1974 and five explosions in 1998. But after that, India declared "nuclear moratorium" and has not exploded nuclear weapons. However, most technologies need to be tested to keep them functioning. Most nuclear weapon states use simulation to check weapons. From the earlier tests, has India got enough data to keep these nuclear weapons by using simulation? If the data is not enough, will India need more explosions?

(9) The ninth question: Will India join NPT or CTBT?

Related with the eighth question, the ninth question is when will India join Non Proliferation Treaty or Comprehensive Test Ban Treaty? It is easy to understand that the image of these treaties is not good in India. When China exploded nuclear weapon in 1964, both Japan and India tried to request US or other countries to extend deterrence (nuclear umbrella). Despite that US assured Japan to retaliate by their nuclear weapons if Japan was attacked by enemy, US and other countries including USSR declined India's request for the same. India decided to develop nuclear weapons themselves because this was the only option for India. And in the view from India, NPT and CTBT assure five states (US, UK, France, Russia and China) as nuclear weapon states but not India. Thus many Indians believe this to be one kind of discrimination. As a result in 2008, Prime Minister Manmohan Singh declared that India will not sigh the CTBT.¹¹ However, if India joins the NPT and CTBT, India will be one kind of "formal" nuclear weapon states.

Web source: <u>http://www.hindustantimes.com/india-news/newdelhi/strategic-command-to-acquire-40-nuclear-capable-fighters/article1-599141.aspx</u> (accessed on 15 June 2014). ¹¹ "India will not sign CTBT, says Manmohan" (GEO World, 12 June 2008)

Web source: http://www.geo.tv/6-12-2008/19173.htm (accessed on 15 June 2014).

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lssue No. 277 June 2014

3. Implication for Japan-India Relations

India needs to answer all the above nine questions in the near future. And these nine questions will affect Japan-India civil nuclear cooperation. If India changes "no first use" or "nuclear moratorium", Japan will not cooperate with India because Japan is afraid that India might use Japan's technologies for military purpose. If India joins NPT and CTBT, Japan will agree with India very easily because these treaties are a symbol of responsible nuclear states for Japan. Command chain related matters will not affect the relations because of very technical matters. The case of how to deal with Pakistan has a somewhat mixed response. In most cases, Japanese do not notice about India's nuclear strategy towards Pakistan, but if US and European media criticize India's change, Japan will follow the move. India needs to be careful of a likely situation.

In any case, while they monitor China and other countries, Modi government will update their nuclear doctrine carefully. This means that India has the initiative to decide how to promote Japan-India civil nuclear cooperation.

Remarks: Opinions expressed in this contribution are those of the author.

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