BAŞKENT ÜNİVERSİTESİ

AVRUPA BİRLİĞİ VE ULUSLARARASİ İLİŞKİLER ENSTİTÜSÜ

SİYASET BİLİMİ VE ULUSLARARASI İLİŞKİLER ANABİLİM DALI

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UNDERSTANDING AND INVESTIGATING IRAN'S NUCLEAR AMBITIONS:

WHAT CAUSES STATES TO PURSUE NUCLEAR WEAPONS?

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ABSTRACT

This thesis focuses on three questions: First, what type of propositions provides a helpful framework to investigate a state's nuclear ambition? Secondly, what are the driving forces behind Iran's nuclear program. Thirdly, is Iran a threat to international security? Thus, this thesis is not concerned about the type of Iranian nuclear program be it military or civilian program but looks at the reasons of pursuing a nuclear program in the first place. In addition, the researcher outlines international relations security frameworks, before extracting a hypothesis and applying it to the case of Iran. It is also important to apply theoretical frameworks in analyzing Iran's nuclear intentions. For this purpose, three theories will be utilized and these are realism, constructivism and Copenhagen approach. Furthermore, this thesis provides a summary of technical issues and the current status of Iran's nuclear program and the military aspect of Iran focusing on its missile program in relation to interpretation of realism, constructivism and Copenhagen approach. A narrow assessment of history shows the political development of the case until September 2015. In the literature, it is widespread to comment that Iran might pose an immediate threat for the USA and European security and interests. In the same vein, Iran's situation does offer a chunk of notable reasons which becomes a matter of concern, particularly when it concerns nuclear non-proliferation and the balance of regional security. It is also necessary to investigate the causes of nuclear proliferation on a comparative level. Thus the case of India, Pakistan and Israel will be highlighted although this will not be the focus of the study.

ÖZET

Bu tez üç soruya odaklanmaktadır: İlki, bir devletin nükleeri elde etme isteğini araştırmak için ne tip bir önermenin yardımcı bir çerçeve sağlayabileceğidir. İkincisi, İran'ın nükleer programı arkasındaki itici güçlerin ne olduğudur? Üçüncüsü, İran'ın uluslararası güvenliğe bir tehdit mi olduğudur? Böylelikle, bu tez İran'ın nükleer programının askeri veya sivil olma yönü, yani programın türü ile ilgilenmemekte, bir nükleer programı takip etmesinin arkasındaki nedenlere bakmaktadır. Buna ek olarak, araştırmacı, hipotezini geliştirmeden ve onu İran örnek olayıyla ilişkilendirmeden önce, uluslararası ilişkilerin güvenlik çerçevesini ana hatlarıyla belirtmektedir. Teorik bir çerçeveye başvurmak, İran'ın nükleeri elde etme isteğini analiz etmek için önemlidir. Bu nedenle, realizm, inşacılık ve Kopenhag yaklaşımı olmak üzere üç teoriden yararlanılacaktır. Ayrıca, bu tez, konuyla ilgili teknik meseleler, İran'ın nükleer programındaki mevcut durum ve İran'ın füze programı üzerinden askeri duruşu hakkında, realizm, inşacılık ve Kopenhag yaklaşımının yorumları ile bağlantılı bir özet sunacaktır. Dar kapsamlı bir tarihsel değerlendirme, örnek olayın siyasi gelişiminin Eylül 2015'e kadar olduğunu göstermektedir. Literatürde, İran'ın ABD'nin ve Avrupa'nın güvenlik ve çıkarları için yakın bir tehdit olabileceği yorumu yaygındır. Aynı şekilde, İran'ın durumu, özellikle nükleer silahsızlanma ve bölgesel güç dengesi göz önünde bulundurulduğunda, dikkate alınacak nedenler yığını ortaya koymaktadır. Nükleer silahlanmanın nedenlerini, karşılaştırmalı bir düzeyde araştırmak gerekmektedir. Bu nedenle, bu çalışmanın odağında olmamasına rağmen, Hindistan, Pakistan, İsrail örnekleri vurgulanacaktır.

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ACRONYMS

Atomic Energy Organization of Iran AEOI

Atoms for Peace Program AP

Anti-Ballistic Missile Treat ABMT

European Union EU

Gulf Cooperation Council GCC

International Atomic Energy Agency IAEA

Massachusetts Institute of Technology MIT

Mutually Assured Destruction MAD

Non-Proliferation Treaty NPT

Non-Nuclear Weapons States NNWSs

Nuclear Weapons States NWSs

United Nations UN

United Nations Security Council UNSC

United Nations Security Council Resolutions UNSCR

United States of America USA

INTRODUCTION

The proliferation of nuclear weapons might pose a serious danger of triggering a nuclear war. One hundred and ninety countries signed a treaty prohibiting and managing the Non-Proliferation of Nuclear Weapons. The Non-Proliferation Treaty (NPT) came into active force in the year 1970. According to NPT Conference of 1995 signatories to the Nuclear Non-Proliferation treaty agreed to indefinitely extend possibly an effective nuclear non-proliferation framework. The NPT is now established as the center of global nuclear non-proliferation policies. A narrow summary idea is that every state should have the right to use nuclear energy for civilian reasons, however the military utilization is prohibited and solely allowed for the five countries that exploded a nuclear device before the 1st of January 1967, and these are France, China, United Kingdom, Russia and USA. All types of control and verification in order to enforce compliance by member states of the NPT are conducted by the International Atomic Energy Agency (IAEA). The founding of The IAEA can be traced back to the launch of nuclear non-proliferation efforts conducted by the Atoms for Peace Policy in 1953. Atoms for Peace Policy statement was pronounced by the former USA President Dwight in 1953 at the United Nations (UN).

Security issues has been raised by the non-aligned and non-nuclear weapon states which for example called for the disarmament such as calling for the disarmament of the nuclear arms owned by the five nuclear weapon states, in line with Article 6 of the NPT. Under Article 6 of the NPT, signatories of the agreement seek to follow up on consultations under the principle of good governance to put strong regulations on

the control and eradication of nuclear arms all. In addition, there are demands calling for member's legal rights to utilize civilian nuclear power. During the era of the Cold War two states militarized their nuclear programs and they were not regarded as nuclear weapon states under the NPT, these were Israel and India. After the end of the Cold War there were four cases of nuclear proliferation that attracted serious focus. These were North Korea, Iran, Iraq and Pakistan. In 2006 on the 9th of October, North Korea tested a nuclear device arousing affirmed suspicions that the state was pursuing a military nuclear program. North Korea also developed intercontinental ballistic missiles, further testing them several times of the last few years. The second state of proliferation was Pakistan, conducting a successful a nuclear test in 1998 due to conflict and tension between Pakistan and India.

Pakistan possesses ballistic missiles capabilities. International Atomic Energy Agency in 2008 noted that Iraq had highly developed nuclear weapons program however with limited capabilities to deliver the weapons as was stated also by the UN Special Commission in 1991. The forth case that of Iran has caused serious debates among the United Nations as well as the UN Security Council (UNSC) as Iran was suspected of developing nuclear capability from 2003. Iran also started developing ballistic missiles capable of carrying nuclear warheads.

Research problem

The question of how to stop nuclear proliferation is linked to the task of investigating the reasons why some countries execute nuclear weapon programs. By investigating a country's ambitions in acquiring a nuclear bomb, solutions can also be created to manage nuclear proliferation. This study therefore aims to review the theoretical approaches to nuclear proliferation so as to provide an account of Iran's nuclear program.

Research objectives

First this research seeks to investigate the driving forces behind Iran's nuclear program. Many questions have been raised by various researches as to the factors driving the Iranian nuclear program. The objective of this study is to open up the major reasons as to why Iran is pursuing a nuclear program. It is important to note that Iran is not the only state with a nuclear weapons program or that has pursed such a program. Therefore, the reasons collected and investigated can be numerous and related in various instances.

The second objective of this study is to assess if Iran's nuclear program is a danger to local and global security. Security is of paramount importance to the international system. States contribute stability or instability through their actions or inactions. Therefore, to investigate Iran's nuclear actions such as nuclear proliferation and also Iran's inaction such as violation of international laws of weapons if any helps to be able to understand the threat posed both on a regional and global scale. The types of security affected will also be identified as a broader view of security is necessary to understand.

The final objective of the thesis is to assess the adequacy of international security theories and frameworks in explaining Iranian nuclear program. Several security frameworks and theories have been formulated it is imperative to study which ones can provide a structural examination of data and facts on the case study in question that is the Iran nuclear program. A systematic study is essential to come up with an organized conclusion of the relevant data and facts about the Iranian nuclear program.

Research questions

The objective listed above lead the research to ask important questions. Firstly, what are the driving forces behind Iran's nuclear program? The forces to be examined are not confined to political matters but also socio-economic factors that may have or are propelling the Iranian nuclear program. To answer this question systematically entails a background research of the Iranian political and social structures as major factors influencing the defense policy of Iran. The forces pushing the nuclear agenda in Iran must be divided into intra and external categories. The former forces include those factors emanating from within Iran, either from a regime perspective or from a citizen point of view. On the other extreme, there are external forces that are those factors stirring the nuclear agenda from outside Iran. These might include but not limited to regional politics and the unequal distribution of power at the UN as well as international regulatory laws concerning nuclear programs such as the IAEA.

Having answered the first question, the researcher is led into another question that is the security impact of Iran's nuclear program. Does Iran's nuclear program pose a threat to regional and international security? These effects might have regional foundations but at the same time some effects will expand into the global security system as the balance of power and complex international relations of various state and non-state actors come into play with the issue concerned. Last but not least the researcher seeks to connect the above questions and objectives in an attempt to provide a meaningful examination of the theoretical relevance of the various frameworks used in the Iran nuclear case study. Therefore, do certain security theories adequately explain the forces behind Iran's nuclear program? A multifaceted questioning approach seeks to understand the Iran nuclear program from a diverse perspective. This collaboration is necessary to give the study a broader and deeper scope.

Justification of the study

The study of nuclear proliferation is of utmost importance in understating the threats to international security and regional order. The thesis will therefore be of importance in understanding the parameters of what causes nuclear proliferation. It is also necessary to understand the relationship between international and domestic factors in nuclear proliferation. Scott's model will also be tested and assessed on its validity to give policy directions in the attempts of nuclear non-proliferation by governments and organizations. For the academic field, the thesis will provide a theoretical study of international relations theories, international conflict management and arms control. The thesis will highlight current issues, challenges, gaps and loopholes and thereby it will contribute to academic knowledge on nuclear proliferation.

A research methodology is an approach that explains what one has to do in order to manage the research from open to close. The research is footed on a case examination design derived from documentary search. Documentary exploration is the study of recorded human communications, such as books, websites, and laws mostly. This study is mostly qualitative rather than quantitative because of the nature of the issue under investigation. Documentary search included secondary sources of information including text books, periodicals and articles; these will be used to inform the investigation. The internet sources will also be utilized extensively to supplement these sources.

The inaccessibility of useful firsthand information is one limitation the study has faced. While a case study is relatively cheap in terms of time, the design posed some restrictions on the quality of findings for the purposes of generalizations. The geographical location of the current researcher hinders observations as a data collection tool which in turn affects the quality of the investigations. The study made particular reference to the intentions of Iran in pursuing a nuclear program. Therefore the study is not concerned about the type of nuclear program which Iran is pursing thus it could be civilian or military program that is not the focus of the research. The research will investigate the reasons for the overall nuclear program in Iran. A holistic approach will be made to study the situation from international factors to domestic factors that contribute to proliferation. It is also necessary to investigate the causes of nuclear proliferation on a comparative level thus the case of North Korea, India, Pakistan and Israel was highlighted although this will not be the focus of the study.

CHAPTER 1:

THEORETICAL APPROACHES TO NUCLEAR PROLIFERATION: A LITERATURE REVIEW

Theoretical arguments about how nuclear proliferation should be interpreted and whether cases of future nuclear proliferation can be predicted have emerged as a security topic worth investigating. Several reasons can be noted for this. The downfall of the Soviet Union has increased calls for nuclear non-proliferation and disarmament. It is also academically prudent to analyses other relevant theoretical arguments. Three theories can be utilized to reach this end; realism, constructivism and Copenhagen approach. This research will focus on these three due to the inability to exhaust all security approaches in one paper. Secondly realism and Copenhagen approaches gained a lot of reputation in the international relations field as sound analysis frameworks. The wide research carried out under these two has been so exhausted to the point of losing meaning. Hence an examination of realism and Copenhagen approaches is vital. Lastly but not least constructivism links domestic influences to state's foreign policy behavior thus is worthy taking a look at. This chapter will discuss the history, theoretical assumptions of each theory and the relevant interpretations to international security studies revealing the strengths and weakness of each school of thought.

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¹ Barry Buzan, "New Patterns of Global Security in the Twenty-First Century." *International Affairs*, (1944-), 67, 3, (1991), pp. 43-45.

1.1 A theoretical view of realism

Realism is as old as history for it was noted as far as the end of the First World War. It is also associated with theories of Thucydides, Machiavelli and Hobbes. Realism has been branched further into classical realism and neo realism. Classical realism was the ancient interpretations of social and political relations. Hobbes, Thucydides and Machiavelli are closed related to realist thought and they offer a set of interpretations about society similar to those in realism. International relations authors such as Hans Morgenthau and Kenneth Waltz are well known realist proponents.²

Thomas Hobbes' work called The Leviathan noted that politics was in a pre-societal state of nature where there was no social contract or agreements.³ Hobbes made three propositions about the state of nature firstly that men are all equal, secondly that men interacted in anarchy and lastly that men are motived and drive by desire for glory which comes through intense competition. The combination of these three assumptions will result in a war of all men against all. The notion that men are equal is associated with the idea that weaker can also defeat the stronger through secret plots or by uniting with other weaker men to form a stronger union. This results in the equality of capacities and therefore equality in execution of goals. In short, a man is as able to do or have anything as another man thus every man ought to have as much as other men. However, the notion of scarcity and limited opportunities hinders men from having an equal share hence the result is natural enmity. The intense

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² Kenneth Waltz, "Realist Thought and Neorealist Theory," *International Affairs*, 44, (1990), pp. 39-48

³ Thomas Hobbes. *Leviathan*: 'Or, the Matter, Form & Power of a Commonwealth, Ecclesiastical and Civil', 1904. (A. R. Waller University Press), p. 29.

competition increasing hostility as man initially invade another for prestige, then secondly attacks or defends for security and lastly becomes hostile only to maintain reputation. Hobbes argues that despite the absence of gains, men would only resort to defensive actions due to the fear of other men. Men will fight for reputation because he expects that his peers will respect and value him at the same degree that he values himself. Such a case is worsened by the absence of a central authority which in modern times is referred to as a government. There is an absence of a common and legitimate overriding power to check and balance the conduct of men creating a perpetual state of anarchy or disorder and war. Hobbes describes the conditions in the polity to be short, poor, brutish and solitary. Inequality is inevitable this creates an imposed order of hierarchy based on force and capacity rather than on consent. It is important to note that while conflict is not always occurring, the natural condition is that conflicts will swiftly and easily turn into violent reaction in most cases.

Hobbes went on to note that such a society never existed in reality. As one way or another mankind always formulate other peaceful means of resolving conflict other than war. It can be argued that Hobbes' theory is mostly applicable to the behavior of great powers and to the condition of global politics. This is because interactions between unequal states are most likely to be regulated by another set of ideas other than what Hobbes claim. Some questions have been asked as to the specific application of Hobbes' theory since international politics is vast, which parts of politics are characterized by disorder, equality and selfishness? To answer such a

⁴ Thomas Hobbes. *Leviathan*: 'Or, the Matter, Form & Power of a Commonwealth, Ecclesiastical and Civil', 1904. (A. R. Waller University Press), p. 29.

question, it is important to look at other theories that explain further the interaction of men in the world as a global society.

Like other classical political thinkers, Thucydides was a realist who commented on issues of the international system, the individual and the state in international politics and lastly the reasons for war and its justification. In his masterpiece, the History of the Peloponnesian War he argues that the international system has no overreaching authority to regulate the behavior of actors. This might explain why a state might have a nuclear program for military of civilian use because a nuclear capable state has leverage over regional and international politics. Hobbes assumptions of the State of Nature, all men are equal and thus the weak has also strength and capacity to kill the strongest, by secret machination as well as by confederacy with others that are facing the same threat zone. North Korea being initially a relatively weak state compared to the USA would want to achieve parity through technical advancement especially in the field of nuclear development. This might explain why like North Korea might be interested in a nuclear weapons program for peaceful uses or otherwise. The state might feel threatened by the hegemonic dominance of the USA in the Korean Peninsula as well as the world.

Insecurity and fear, the desire for prestige or glory, and self-interest are normal and natural human characteristics, hence implying that human conduct has uniformity and is very predictable.⁶ A state's insecurity and fears cannot be accurately predicted

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⁵ Waltz, "Realist Thought and Neorealist Theory," pp. 39-48.

⁶ Hans Morgenthau, *Scientific Man versus Power Politics*, (Chicago: University of Chicago Press, 1946), pp. 12-32.

but considering there is a threat from a regional opponent chances are that a nuclear program can be meant to increase a state's prestige and cover up insecurities regionally and international. It is also important to balance between need for nuclear development and insecurity. To answer this question accurately it is important to understand a state's foreign policy as well as regional balance of power. On a general note when this argument is applied to states it can be seen that there is a desire to acquire a defensive and hegemonic position by states in an attempt to seek a redress caused by the disparities in the international system. Such disparities include the structure of the international system comprises the UN which has the five permanent members such as the USA, Russia, Germany, France, Britain and China holding more decision-making power than the rest as a result of the post-World War 2 settlement putting the strong nations into veto holding positions. This might explain why the permanent powers of the UN with nuclear weapons all have veto power to regulate the weaker nations and ultimately govern the international system based on a power position.

The tenants posed in this theory shows why states get into wars and also recognizes the differences in power capabilities of states and its impact of state actions. Therefore, power can be obtained through various means including nuclear capabilities. A state can therefore try to obtain power through its nuclear program. The most outstanding weakness of these assumptions is that they are power oriented basing only on a state's nuclear program as power based thus fail to identify other factors such as the power of democratic citizens to influence foreign policies,

⁷ Hans Morgenthau and Kenneth Thompson, *Politics Among Nations*, 6th edition (New York: McGraw-Hill, 1985), p. 165.

idealism and the rule of law instead of power. These assumptions are linked to realism in regards to state survival and the use of capabilities to pursue national interest.

In this instance, how much support does a state receive on its nuclear program from citizens? To answer this question, it is important to understand that in democracy citizens holds parliamentary as well as presidential elections to decide the nation's policy makers including nuclear program. Definitely the decision to purse nuclear weapons might not be directly a citizen demand but the backing of the citizen might propel a regime to pursue nuclear capabilities. Thus the elections held are a source of citizen support to the administration that whatever defense policy the government is working on, it has a mandate from the people to execute freely. In a way, this notion attempts to explain why states seek military dominance over others and why states priorities survival over morality as was during the two disastrous world wars when Germany under Hitler pursed an aggressive foreign policy towards Europe. Again, the issue of morality seems to be subjective. The western world perceives it to be moral to have a nuclear program for peaceful uses at the same time they regard North Korea's pursue of nuclear program as immoral and problematic.

Hobbes argued that human beings are by nature individualist and seek to maximize power at the expense of others. Social structures are usually ineffective in taking out the human nature which for him was a perpetual restless desire for power that could only end in death. In any social or political setup, human beings by nature are always

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⁸ Niccolo Machiavelli: 'The Prince', 1513 (Fordham University) pp. 29-35.

⁹ Kenneth Waltz, *Theory of International Politics*, (Reading, MA: Addison-Wesley, 1979), p. 88.

struggling for power. A state's nuclear program might be explained as a struggle for power and dominance inherent in human nature. However, power can still be obtained without the need to possess it at the expense of other states. A state is also entitled under international law to defend itself against perceived enemies. As a result, mankind and states tend to seek power and protection from such a lawless state of nature as the struggle for scarce resources becomes fierce. Hobbes' argument seem to be less applicable in today's world as states are signatories of international law and members of organizations that make binding rules on all members thereby removing lawlessness. Thus, to state that a nation is pursuing a nuclear program because of a lack of central authority might not be accurate enough. When such an interpretation is taken on an international level it entails anarchy, state egoism and struggle among international actors who are naturally selfish. ¹⁰ It implies that a state is by nature offensive and defensive which has led other theorists to modify the theory into defensive and offensive realism. 11 This is in contrast to offensive realism which argues that a state might be seeking to maximize her influence and power economically, militarily and socially in order to maintain hegemony, security and domination as there is no central authority to guarantee the survival of actors in the system. These assumptions therefore reveal that the lack of a central authority combined with an egocentric human nature in the international system breeds conflict and struggle amongst nations. The strength of this argument is based on the evidence of struggle, conflict and power maximization socially, economically and politically in the international system due to a lack of central authority which might be said to have been a natural instinct in mankind.

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¹⁰ Robert O. Keohane, *International Institutions and State Power: Essays in International Relations Theory*, (Boulder, Colo.: Westview, 1989), pp. 15, 58.

¹¹ Robert Keohane and Joseph Nye, *Power and Interdependence*, (Palmer Grave Press, 1987), p. 251.

In addition, realism claims that states are either defensive or they are offensive in their international relations towards each other. It can also be argued that the pursuit of nuclear weapons by the Soviet Union and the USA during the Cold War era was either defensive or offensive realism or simply a combination of both. Therefore, while for Hobbes, realism answers a minority of questions in international relations, it still leaves the majority questions unanswered. It is important to define types of realism. First there is offensive realism which is a structure oriented school of thought proposed by neorealist such as John Mearsheimer. The theory views the anarchic structure of the global system as the main cause for aggression by states. It is based upon five main propositions which are:

- I. The main actors in the anarchical international system are the great powers
- II. All states in the system have military capabilities which are by nature offensive.
- III. States do not possess a total ability to know the intentions of others
- IV. The main goal of all states is survival
- V. All states are rational actors and they all have the capacity to craft policies aimed at maximizing their power in order to survive

The major aim of offensive realism according to Mearsheimer is to recreate the 'status quo' bias under defensive realism postulated by Kenneth Waltz. It is important to note that these two variants of neorealism agree on the idea that states are focused more of power and security maximization. The disagreement is about the types, levels and scope of power needed to achieve such a goal. Defensive realism

¹³ Peter Toft, "John J. Mearsheimer: an offensive realist between geopolitics and power", 8, (2005) *Journal of International Relations and Development*, (2005), p. 23. 10.1057/palgrave.jird.1800065. Obtained 29 October 2016.

¹² Kenneth Waltz, *Theory of International Politics* (Reading, MA: Addison-Wesley, 1979). pp. 6.

which shall be discussed in detail in the next section focuses on status quo power seeking to protect and maintain their positions by way of securing the already existing balance of power. On the other hand, offensive realism argues that states seek to revise the status quo and maximize their power through aggressive policies rather than just through passive defense policies. In addition, offensive realism argues that the global system incites great powers with appealing incentives such as control and influences in order to secure their survival and maintains their security.¹⁴

The order of the day is one marked by an anarchical global system that is one which has an absence of a central regulatory authority to enforce laws and punish offenders. The high unpredictable and uncertainty in the intention of state actors as well as the presence of military capacities will result a perpetual state of fear and mistrust amongst states and hence they tend to rely on self-aiding mechanisms to ensure their survival. To offset this fear and unpredictability, states will end up maximizing their material power base relative to what other states are doing. Mearsheimer argues that states will always look for chances to alter the balance of power by way of incrementally adding their material power bases at the expense of their competitors. This happens because states believe that the more military capabilities they possess the more secure they would become over other states even at the detriment of other states in the global system as they aim for more hegemony in an anarchic system.

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¹⁴ John Mearsheimer, "The false promise of international institutions." *International Security*, 19, 3 (1994): pp. 5-49.

¹⁵ Wang Yuan-Kang, "Offensive Realism and the Rise of China", *Issues & Studies* 40, 1, (2004), p. 177.

The best way for states to achieve this goal would be to have robust offensive policies provided that the policies are rational to the concerned state; they would even go on to purse expansionist strategies. Since global hegemony is an impossible goal due to vast global space and limited resources, states focus more on achieving a regional type of hegemony thus establishing influence and control in their respective regions. The consistent need for more power and security creates more intense competition even reaching as far as going to war with would be opponents. After establishing regional hegemony, strong states seek to preserve the status quo.¹⁶

However offensive realism's obsession with revisionist actors seems to go against the assumption that state intention is always uncertain when in reality it is certain that states seek to maximize power and challenge the status quo. Aggressive policies pursued by great powers in order to maximize their power actually leads to offensive or defensive justification by other states to counter such moves rather than irrational moves based on theoretical threats. The theory has also been challenged on its premise that states seek to have a geographical hegemony mainly because of limited resources and an inability to control vast global space. This limits offensive realism to a geographically limited proposition and not a system wide theory. Most great powers such as China seek to maximize influence beyond regional borders and they are not limited by oceans. In this case the failure to define what actually constitutes a region will result in analytical shortfalls in the theory as globalization erodes more

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¹⁶ John Mearsheimer, *The Tragedy of Great Power Politics*. (New York, NY: Walton. Norton, 2001), p. 34.

regions into one global community. An example in Europe North-East Asia which are vast regions interacting in a global system.¹⁷

The second category of weakness falls under the scope of offensive realism. The failure of the theory to address domestic politics exposes the theory to serious limitations since no specific focus was given to a state's internal political culture in terms of its economy, religion, history and society preferences of which these play a significant role in decision making in all states which ultimately affects the state's behavior on the international stage. 18 The narrow focus on state security alone ignores transactional opportunities such cooperation in international organizations and threats such as terrorism as major issue in determining a state's defensive or offensive strategies. States are also concerned about non-security interest such national unification in North Korean, political and economic ideology in the USA and human rights issues across European states as important sectors of their international relations. All these aspects are very important in gaining or maintain influence and control as they are regarded as soft power variables. These weaknesses affect the theory's empirical reliability and thus fall short as a sound and valid framework to use in understand international relations. The question of morality or ethics was dealt with mostly by Machiavelli who argued that morality has no place in international relations. His assumptions are applied to both domestic and international politics. 19 Therefore whatever is good for the state must be justified and executed despite its breach of any moral standard, civilization or ethics. Immoral

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¹⁷ Arash Heydarian Pashakhanlou, "Back to the Drawing Board: A Critique of Offensive Realism", *International Relations*, (2006), pp 202.

¹⁸ Keir Lieber and Alexander Gerard, "Waiting for Balancing Why the World Is Not Pushing Back.", *International Security* 30, 1, (2005), pp. 109–139.

¹⁹ Niccolo Machiavelli, *The Prince*, (Fordham: Fordham University, 1513), pp. 30-45.

policies are justified in the international system but at the same time did not reject that such actions are evil rather, evil is good. These assumptions entail that the highest moral value was the survival and the protection of the state by any means necessary or unnecessary and that securing, maintaining and promoting national power was a duty and right of the state.²⁰

Hans Morgenthau came up with other realist assumptions which try to explain international relations. International agreements are binding only when they are beneficial to the state but in essence they could be easily broken once they threaten the survival of the state.²¹ From this basis it can be argued that Machiavelli was pragmatic in explaining the events of the First and Second World War during 1914 and 1945. This period was a combination of immorality in policies of war and struggle for power maximization. The weakness of this is that it was formulated during time of princes and kingdoms which is relatively outdated model in explaining the current international relations architecture. Even the most none democratic states still cooperate on liberal policies such as environmental cooperation and nuclear non-proliferation done by Russia, the USA, South Africa and India. State behavior should therefore be analyzed with a wider framework interpreting current dynamics of international relations. Hans Morgenthau is considered as an outstanding twentieth century figure in the field of international

²⁰ Robert Giplin, War and Change in World Politics. (Cambridge: Cambridge University Press, 1981), p. 67. ²¹ Waltz "Realist Thought and Neorealist Theory," pp. 39-48.

politics. Morgenthau's publications fall under the tradition of political realism in international relations theory.²²

He came up with the "six principles of political realism" as stated in his book *Politics* among *Nations*.²³

These are:

- I. Politics, similarly to society, is administered through objective laws which are influenced by human nature. A nature which is eternal: hence it is plausible to develop a theory that reflects the presence of such objective laws.
- II. The main feature of political realism is the function of interest explained in terms of power. Political realism argues in favor of the rationality, objectivity and unemotional political and social behaviors.
- III. Realism claims that interest in terms of power is an objective categorization which is generally valid but not with a one size fit all meaning. Power should be seen therefore as the control and dominance of man over man.
- IV. Political realism recognizes the moral importance of any of political behavior.It is not blind to moralist as such but realism strikes a balance between moral demands and prudent political behavior.
- V. Political realism disregards the moral beliefs of a particular state with the moral laws that operate in the world. It argues that interest defined in terms of

²² Hans Morgenthau, *Scientific Man Versus Power Politics* 1946. (Chicago: University of Chicago Press, 1946), pp. 12-32.

²³ Hans Morgenthau and Kenneth Thompson, *Politics Among Nations*, 6th 1edition. (New York: McGraw-Hill.1985), p. 165.

power saves us from the excessiveness of morality excess and political foolishness.

VI. The political realists maintain the independence of the political sphere. It is based on a universal notion of human nature.

He argued that politics, just as in any has society, is governed by laws which are objectively rooted in human nature. In this regard, he attempts to argue that laws, in this case foreign policies, are formulated based on human nature which is egoistic and power centric. While he is aware of the effects of morality on political actions, he however declares that under realism the political interest of a nation is far more significant than universal morality of any given community in international relations. States therefore seek to follow a foreign policy agenda that is both state centric, maximizing benefits and minimizing risks. Morgenthau notes his second principle as simply the utility of power in international relations. He argues that power is the control of man over man. As man possess territories, resources and influence the one with more power ultimately controls the way of life in the polity.²⁴ Power in this regard is defined in terms of political and military strength. Therefore, in discussing his ideas it can be argued that political leaders think and act in terms of power defined as political interest. Universal moral principles or in modern terms; international laws cannot be fully applied to the actions of states as they view morality as a threat to national interest.²⁵ This conclusion is based on the premise that Morgenthau calls for a balance in political policy between the influences of morality and power as more prudent than any extreme end of the two.

Morgenthau and Thompson, *Politics Among Nations*, p. 160.
 Arnold Wolfers, *Political Theory and International Relations*, (Johns Hopkins University Press, 1962), pp. 67-70.

Kenneth Waltz reformulated the assumptions of realism as a theory. In his book the *Theory of International Politics* 1979, he argued that countries in the global system are of similar fashion such as units of a state in a domestic structure and they have identical interests: Survival.²⁶ In international politics the setup of the global political system is usually influenced by the notion that some countries would rather survive than seek controversial political goals based on a long term view because it will be more costly to go against the status quo thus they behave with the need to realize that goal by any means necessary. Waltz formulated structural realism whereby the international system originates from the association of states. Despite the differences in the characteristics and association of states there are close resemblance amongst states in the international system. Waltz notes that political organizations are formulated by their ideologies, functions and the distribution of abilities. This defines how states are related to each other as units in the system, and how functions are allocated which ultimately determines how power is allocated.

Waltz formulated defensive realism a sub theory of realism. The theory maintains that the anarchical nature of the global system incentives states to pursue moderately well thought policies which are by nature reserved and passive to realize their security. Aggressive and expansionist policies tend to offset the balance of power and this reduced that main objective of states that is to ensure security. The incentives for states to become offensive and the possibility of interstate confrontation are real but these conditions are isolated and limited. States are not aggressive by nature and their first priority is not aggression but the maximizing of

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²⁶ Kenneth Waltz, *Theory of International Politics* 1979. (Addison-Wesley,1979), p. 88. ²⁷ Waltz, *Theory of International Politics*, p. 24.

power. This is because states which seek to establish hegemony in the global system are naturally confronted by opponents trying to maintain the balance of power and the status quo.

States are aware of the costs of aggression and thus aggression becomes self-defeating in order to have more security which is the main aim of states. Aggression is rather not rewarded but punished. The advantages of expansion are limited compared to the costs. The costs include resistance from the forces of nationalism making military invasion very difficult and an expensive undertaking.²⁸ The economic rewards of invasion are limited and the economic cost can be felt also on the invader. It is critical to show the difference between men in the state of nature and states in an anarchical system. The former side is more vulnerable to attack and they can easily be defeated and conquered as opposed to the latter side where states are not that vulnerable since the annihilation is a very challenging and long task to undertake. States prefer to wait for sound proof of threats rather than carry out series of random pre-emptive attacks to offset hypothetical threats thus reducing the security dilemma.

The concept of Mutually Assured Destruction (MAD) implies that states cannot be easily conquered as they have an ability unitarily to respond to the aggression or in association with others. Global anarchy becomes relatively insignificant and states are more inclined to defend rather than offend since states may secure their territories

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²⁸ John H. Herz, *Political Realism and Political Idealism* (Chicago: University of Chicago Press, 1985), p. 87.

without risking the security of other players. Defensive realism still admits that opportunities to expand exist and that states can still exploit them if they seek to.²⁹ Defensive realism addresses an important aspect of domestic politics ignored by offensive realism. The theory claims that the perceptions of the elite in a state determine the international relations policy of the state. 30 The perceptions of the elite modify the structure of the international system according to the concerned elites and this usually offsets the balance of power. Perceptions can be true or false but they are expressed in several ways sometimes in unusual way which might be offensive to other actors. Each state has elites governing various sectors who influence the direction of the state overall foreign policy. These elites can be in the fields of politics, economics, religious and military elites. A worst-case scenario is the military elite influencing the foreign policy of a state. This is usually followed by expansionist policies. They tend to design the grand strategy which may last for decades and might be hard to reverse once implemented. An example is the Japanese Empire desire to expand and conquer surrounding territories including China province of Manchuria from the mid-1930s and ultimate leading to its collapse. ³¹

The order of the international system is organized through the principal of anarchy and hierarchy. As a result, states either operate in authority and subordination based relationships or they operate in total disorder. The similarity in the behavior of nation states over years can be argued to have been caused by the limitations on their behavior imposed by the structures of the global system. The international system is

²⁹ Morgenthau and Thompson, *Politics Among Nations*, p. 173.

³⁰ Morgenthau and Thompson, *Politics Among Nations*, p. 150.

³¹ Kenneth Waltz and John Mearsheimer, "The rise of America and the fall of structural realist", *International Politics Journal*, 51:3, 2014, pp. 295-315.

defined by the principles (economic or political) on which it is built.³² Waltz recognizes the presence of non-state actors such as non-governmental organizations and multinational companies, but regards them as significantly unimportant. The central assumption under structural realism is that state 'balance' is the ideal solution to the problem of anarchy. Weaker nations tend to have no option but to team up with the strong in exchange for favorable treatment. Internal balances are achieved by way of reallocation of state resources toward state security measures and externally balancing by forming associations through official or unofficial treaties or agreements. A case in point is that of the USSR and the USA relations during the Cold War. USA opposed the revolution in Russia for over twenty years. However, the rise of Nazi Germany under Hitler created a common enemy which saw the formation of the USSR and the USA relations during the Second World War. This was despite their differences in history, culture, political organization and goals. The end of the Cold War restored the USSR and the USA hostility and they became opponents. Waltz concluded that at least, states seek to preserve themselves and at most, they seek to have maximum domination.

Since all states place survival on the core of their policies, anarchy is generated as the states regard the structure as a self-help system in which individual states have to take care of themselves. Ultimately their roles and influence are based on the capabilities of each state.³³ The strength of these assumptions is based on the utility of power, units and capabilities in relation to state behavior. The role played by the

³² Kenneth Waltz, "Realist Thought and Neorealist Theory," *International Affairs* Edition 44 (Spring/Summer 1990), pp. 39-48.

³³ Robert Jervis, *Perception and Misperception in International Politics* (Princeton, New Jersey: Princeton University Press, 1976), pp. 76-78.

state is determined by the number of units or states influencing it. It can also be argued that states with greater capabilities tend to seek more power and the desire to influence more units in the international system in an attempt to survive or dominate.

However the view of non-state actors as insignificant tends to undermine a clear view of the nature and structure of the international system.³⁴ Though morality has a selective application under realism, it is generally agreed to date that international laws and liberalism has a far reaching influence on states as evidence by the UN Charter of 1945, several international treaties such a the 1949 Geneva Conventions and additional protocols and Nuclear Non-Proliferation Treaty of 1968.³⁵ Realism has its short comings and a full application might have inaccurate conclusions about states. The theory has limited reference on morality and focuses mostly on selfinterest. The theory assumes that a state does not respect morality and is solely selfserving against other international laws. This is in fact inaccurate as states can cooperate with international organizations with the regards to nuclear regulation and inspections.³⁶ Due to the shortfalls in theoretic assumptions of some realist ideas, scholars also looked at the works for Edward Hallett Carr. In his book, *The Twenty* Years' Crisis, Carr seeks to explain the nature and relationship of power, politics and morality in international relations.³⁷ Man prefers association rather than isolation by their very nature of being rational beings. They form various groups to control or regulate the activities of the whole clan and its members. As a result, politics is the

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³⁴Jean Pictet 'Military Law Geneva Convention' *Journal on Defence*, 32, (1949)

https://www.loc.gov/rr/frd/Military_Law/pdf/GC_1949-I.pdf p. 8. Obtained 12 May 2016.

³⁵ Treaty on the Non-Proliferation of Nuclear Weapons

http://www.state.gov/documents/organization/141503.pdf p. 25. Obtained 15 June 2016.

³⁶ Morgenthau and Thompson, *Politics Among Nations*, p. 165.

association of men in a given polity to achieve a desire goal which is security.³⁸ The relationship is one characterized by authority, influence and power of the members upon each other developed through historical and shared social values. When this concept is applied to states as main actors in international relations it becomes clear that the role of states is to regulate their territory as they please in order to determine their position in the global system. Carr is of the view that state politics should be understood from the nature of man as individuals. Aristotle concluded very well that a man is a political animal.

As political animals, men tend to show various characteristics towards his fellows in two contradictory manners.³⁹ At one point man expresses greed by way of imposing his will on others even against their wishes. This egoistic character can be regarded as inborn and natural. On the other side, men express love or fear which can be seen in the form of socialization that is entering into various social and political communities to interact on areas of shared interests. In the form of fear, men tend to exhibit compliance tendencies towards authority.⁴⁰ Thus societies form and break based on these two emotions. Since the two emotions are sometimes contradictory, there is need to have some form of punitive measures or punishment exercised on the group by a central figure is needed to ensure maximum cooperation. This does not mean that punishment is the only solution to the balancing of interests but also rewards and incentives can be offered for good behavior. Since membership is usually voluntary in nature, the most effective way of punishing offenders is by way

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³⁸ Edward Hallet Carr, *The Twenty Years' Crisis': 1919–1939*. 2nd Edition. (New York: Perennial Inc: 2001), p. 5.

⁴⁰ Tim Dunne, Michael Cox and Ken Booth. *The Eighty Years' Crisis: International Relations 1919–1999*. (Cambridge; Cambridge Press: 1999), pp. 45-50.

of expelling them out of the community or social contract. This is different from the global system whereby states are members and their membership seems to be compulsory in nature. States are thus joined by shared interests and obligations.

However, it is not always the case that states cooperate in the international system due to opposing emotions in play. In order to avoid anarchy, the stronger within the system will resort to coercive measures to regulate the conduct of member states and establish loyalty to the principles of the international system. While this approach seems, feasible It is not practical since states just like men tend to resist coercion especially when there are opposing interest. Loyalty to the system will now be enforced by punitive measure of the stronger upon the weaker and international civilization is now being held through greed and not love. Thus in every community there are weaker groups versus the stronger groups cooperating through coercion or self-subordination. Basing on these assertions Carr is of the view that society is formed upon two foundational thoughts one that is utopian and another that is realistic.⁴¹ In these two types of thoughts, power and morality are the key determinants of state behavior.

Utopianism is characterized by those who seek to remove self-determination form political systems while using values and morality as the social glue tying political system together. On the other hand, the realistic side rejects this notion and claims that an ideal society does not exist and that all state behavior is derived from power and self-interest with little to no consideration of morality. Therefore, politics to the

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⁴¹ Carr, *The Twenty Years' Crisis*, p. 15.

realist becomes the exercise of power and self-assertion so without power there is no politics while to the utopian it is the exercise of values and moral principles in political associations and so without moral consideration there is no true political participation. The use power at the expense of morality is self-defeating nevertheless disregarding power in favor of morality is unsustainable. A far more reasonable and preferable approach would be a balance between power and morality. The fall of Hitler's Germany is a classic example of the adverse effects of power of morality wherein millions where dragged into a catastrophic war killing millions of people during the Second World War. The Assembly in Germany led to the breakup of the Weimar Republic as it pursues idealist politics separated from the use of power to implement domestic policies in 1848.

Carr defines power in simple terms as the capability to enforce or achieve a desired goal. In international relations power is categorized into political power, economic power, military power and social power. These aspects of power are all related in reality but for the sake of discussion they can be broken into small concepts. States possess most of all these types of power relative to each other. Political power is the use of political positions to achieve desired goals. This type of power is mostly in an administrative capacity and is derived from constitutes through a popular vote or by appointment. An example of political power by popular vote is the election of leaders in democratic states such as the USA, Turkey and South Africa be it presidential power or parliamentary power. Political power in the form of administrative

⁴³ Peter Wilson, *The Myth of the 'First Great Debate*. (London; Pennicle Press:1998), p. 34-35.

⁴⁴ Stephen McGlinchey, "E. H. Carr and The Failure of the League of Nations: An Historical Overview".2010. *E-International Relations*. pp. 23-25. Retrieved 30 March 2015. http://www.e-ir.info/2010/09/08/e-h-carr-and-the-failure-of-the-league-of-nations-a-historical-overview/

appointments included the delegation of state authority upon individuals to act on behalf of a state such as the appointment of diplomats to carry out a state's foreign policy. Economic power is the use of monetary and fiscal instruments to achieve a goal. Elements of state economic power includes the Gross Domestic Product (GDP), interest rates, value of currency, scope of international trade, employment base and development capabilities all regulated by a central bank in the concerned state. The USA is regarded a superpower not only because of its political and military might but also its economic capabilities.

Military power is hard type of power which characterized by the use of army and military arsenal to achieve strategic goals. This included the number of foot soldiers, fighter jets and nuclear weapons a state has as well as other conventional weapons. China and Russia are relatively big powers military because of their military capacities in relation to other states in the international system. Lastly but not least is social power that is the use of social values, culture and religion to affect a desire outcome on the international stage. This types of soft power stretches as far as languages and civilization dominance. The Britain has a remarkable social power in the international system through its widely-accepted language and culture by mostly former colonies of the former British Empire. States tend to maximize their power in these for spheres of influence that is political, economic, military and social. In order of important, the realist regards military and political power as more significant to states. However, there is rarely any political or military power without economic and

⁴⁵ Carr, The Twenty Years' Crisis, p. 55.

⁴⁶Michael Williams, *Unnatural Doubts: Epistemological Realism and the Basis of Skepticism*, (Chicago; Palmergrave: 1996), p. 56.

social power through which states are formed. It is important to under types of power in international relation since is through these capabilities that states exercise their will and achieves their goals in the form of national interests. Carr provides a broad framework upon which international relations can be more understood from a realist perspective as he takes into account a lot of important variables neglected by other realists.

1.2 Constructivism

The International relations field after the Cold War provides more dynamic approaches in understanding world politics. The theory of constructivism is one of the paradigms offering an advanced development of international relations security theories. The founding fathers include Nicholas Onuf and Richard Ashley. Alexander Wendt regarded as one of the core constructivist scholar argued that constructivism can be argued to be a form of structural idealism. Ashley oriented approach that gives an understanding in the interpretation of the dynamics in world politics from a social construction perspective that is on how the state actors are constructed internally. This section attempts to discuss the basic assumptions and concepts of constructivism and how the theory relates to modern international politics. A complex international system requires a complex theoretical framework to understand. Constructivism attempts to project itself to be a theory that can answer such a demand. Constructive is a sociology theory of global politics that stresses that the international system is socially constructed through values and cultures

⁴⁸ Alexander Wendt, *Social Theory of International Politics*, (Cambridge: Cambridge University Press, 1999), p. 12

⁴⁹ Samuel Barkin, *Realist constructivism*, (Chicago. International Institute Press Inc, 2003), p. 5.

embedded in human nature by way of history and civilizations.⁵⁰ Therefore in order to understand state behavior in international relations one has to comprehend the social identities that make up a state. The theory attempts to view state conduct through state characteristics such as religious norms and cultures and languages that shapes the social fabric and mental processes of its inhabitants. States are unique and they have core units that define a state's political, social, economic and military policies on the domestic and international stage. The USA has a unique international policy different from Russia's foreign policy character. Thus, the Cold War was a byproduct of the inevitable clashes of these deeply entrenched opposing identities. While realist also focuses on state characteristics, the constructivism goes a sate further to identify how policies are formed from bottom up rather than top to bottom as claimed by classical realists.

The culmination of the Cold War elevated the notion of constructivism in security debates in international theory field. Under constructivism, anarchy and the unequal distribution of military capabilities do not determine a state's identity and its relations with others. A strong military capacity of a country can be perceived as a menacing power or protecting capability by other states. Does this then mean that a state's military structure becomes a menacing status by pursing nuclear weapons? If the acquisition of nuclear weapons is mainly for military prestige why is it that regimes call for civilian nuclear energy? This view seems to be half true while it can be argued that the military has an important need to be menacing, it is also untrue

⁵⁰ Robert Howard Jackson and George Sorensen, *Introduction to International Relations: Theories and Approaches*, 4th Edition. (Oxford; Oxford University Press, 2010), p. 166.

⁵¹ Fearon Simon and Alexander Wendt, *Rationalism v. constructivism: a sceptical view*. (London; Handbook of International Relations. Simmons Inc; 2002), pp. 52–72.

that one sector of the government determines the defense policy of a nation. For instance, in modern Pakistan the parliament as well as the presidential office play important roles in defense policy. For instance, the USA Nuclear weapons capability is perceived differently by Taiwan as compared to a nuclear weapons program in the hands of China. Thus by investigating the military structures, goals and capabilities of North Korea or India and its regional peers one can conclude that, states seek to maximize power in relation to the regional and international military status of other states. State's political identities such as governance models and its social structures are also important factors that determine the type and quality of relations among states. North Korea's social structure has an overwhelming patriotic populace that is very supportive of the government's policies lead by Kim Jong-un since 2011.

Similar political identities such as governance structures and long-history of cooperation between two or more states, for instance, can be a basis upon which cooperative security system are established; but distinct political identities and long-history of tension can result in the construction of a competitive international security system. Countries cooperate in nuclear programs based on their governance structures, goals and history. It might be argued that Iran's nuclear cooperation with Russia and North Korea in terms of expertise, machinery and equipment is a direct result of similar constructive structures.⁵³ As opposed to neorealism which bases basis its claims on the dominance of material power both economic and military, and neoliberal institutionalism which accepts a relatively narrow influence and role of

⁵² Jim Walsh, "Surprise Down Under: the secret history of Australia's nuclear ambitions". *The Nonproliferation Review*, 1997, p. 5.

⁵³ Jeffrey Lewis, 'Institutional environments and everyday EU decision making: rationalist or constructivist?' *Comparative Political Studies*, (2003), pp. 36.

non-material powers in international relations, constructivism gives top priority to the significance of a state's sources of power. ⁵⁴ In the same manner the discursive power of the USA should be determined by ideas, culture as well as material power. What determines the nuclear policy of the USA is very much influenced by these notions. The USA's economic status backed by a sound economic industry is very much capable of favoring nuclear programs. However how does culture and history contribute towards USA's defense policy? A closer clue might be a culture of high national esteem and values is more defensive and protective than a culture with less regard to its values.

These factors and influences through states interact to construct the international system. Discursive power operates by creating and producing subjective perceptions. It aids in explaining how the material structure, international events, states' political identity, relations between or among states, and any other social relations should be described and understood. With discursive power, the same material expression can be manipulated to produce certain interpretation and weaken alternative meanings. A typical example is that the USA due to its discursive power is able to present unique interpretations for Pakistan nuclear position and North Korea's nuclear weapons programs. These political and security issues are not a result of material power alone or its distribution but they are a result of a construction through the USA's discursive power. Therefore, the USA through its discursive power might perceive the acquisition of nuclear weapons as beneficial, moral and necessary to its national

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⁵⁴ Scott Sagan, *The Causes of Nuclear Weapons Proliferation*, (Stanford; Stanford University, California; 2008), pp. 81-82.

⁵⁵ Sagan, The Causes of Nuclear Weapons Proliferation, pp. 89-90.

⁵⁶ Steven Miller, Scott Sagan, 'Nuclear power without nuclear proliferation?" *Daedalus Security* Review, 138, (2009), p. 4.

survival.

The possibility of a monopolistic or a cooperative global security system challenges the significance of the balance of power concept in international politics. This is because according to constructivism the material power of other states does not by default imply the presence of military threats, at the same time the theory claims that it is not necessary to assume that every increment in material power of other states must be met by a balance in power.⁵⁷ The concept of balance of power can be substituted with that of the balance of threats. This means that what a state should balance is a menacing military power and not balancing a state that does not threaten other states with its military power. However, what categorizes a state as a threat is largely dependent on the governance type and role identities that a state has. International norms, values, practices and institutions are also constructed through socio-political interactions, and these also determine the roles, identities and meanings that a state can refer to in terms of categorization of state actors.

In summary, constructivism advances the view that most aspects of international politics are constructed by history and society, rather than by the unavoidable effects of human nature or other significant features of international politics. Constructivism is contrary to claims made by neoliberalism and neorealism by proving that important aspects of international relations are a product of social construction and

⁵⁷ Hecker Siegfried. 'Lessons learned from the North Korean nuclear crises'. *Daedalus Security Review*, 139, (2010), pp. 44–56.

that they originate from the continuous processes of social interaction and practice.⁵⁸ There are two basic features of constructivism, first that the systems of human association depend largely on shared ideas and culture rather than material external forces, and that the positions and goals of different actors are a product of these established ideas and not by their given nature. 59 Thus majority of people in different countries regard access to nuclear energy, facilities and capability as their legitimate national right. These nationalist stances are usually harnessed by populist governments in power through political or social tools such as propaganda and religion. 60 Thus, militarization of nuclear programs and nuclear saber rattling is a propaganda instrument employed by the leadership as a way of arousing domestic and regional public support and sympathy.⁶¹ To further understand the connection between nationalist populist policies, one can note that states acquire strategic nuclear supremacy as this is important for the their domestic, regional and international agendas, as it would enable the concerned state to enhance its capacity, influence and power across the region in spite of security differences with various other states.⁶²

At the local level of constructivism then, nuclear programs have been, to a significant extent, influenced by forces of national pride and identity.⁶³ However, the emphasis

⁵⁸ Abraham Itty. *The Making of the Indian Atomic Bomb: Science, Secrecy, and the Postcolonial State* (London: Palgrave Inc; 1998), pp. 23-35.

⁵⁹ Marth Finnemore, *National Interests in International Society*. (Ithaca, New York: Cornell University Press.1996), pp. 12-23.

⁶⁰ Dai Xing. *International Institutions and National Policies*. (New York: Cambridge University Press; 2007), pp. 56-78.

⁶¹ Beth Simmons and Daniel Hopkins, 'The constraining power of international treaties: theory and methods'. *Political Science Review*, 99, (2005), pp. 623–631.

⁶² Etel Solingen, *Regional Orders at Century's Dawn: Global and Domestic Influences on Grand Strategy.* (Princeton, New Jersey: Princeton Univ. Press; 1998), pp. 34-67.

⁶³ Mohamed Shaker, *The Nuclear Non-Proliferation Treaty: Origin and Implementation 1959–1979*, (New York: Oceana Press; 1980.), pp. 20-23.

of domestic constructivist assumptions emphasizing nationalism finds its way up to the international level: a state's bitterness and victimization in foreign policy can be argued to be a result of long ill-treatment by other powers. Thus, there is a legitimate frustration with what states perceive as security double standard in the nuclear policy that would maintain their enemy's strategic dominance and supremacy but deny nuclear capability and facilities to other states as regional powers. From this discussion, ideological reasons far outweigh strategic goals in motivating a state in pursuing a nuclear program, and propaganda policies. 64 Realist models that place a premium on external forces alone and strategic regional insecurity of states do not stand up to the ability to fully explain a state's nuclear ambitions. Fears of superpower biasness have been increased by the culture of weak state victimization, and the aggressive sense of superpower nuclear policies that has dominated the nuclear relations of states. This results in weaker states seeking deterrence or defensive capabilities. Furthermore, with military nuclearization usually perceived as a symbol of national pride, the nuclear program of a state draws popular support in constructivist theories, rather than regional strategic explanations.

In North Korea, nuclear decision-making capacities is concentrated in the hand of ruling elite and military officers, the nuclear program might enable the government to increase its self-identity as a regional power of some sort.⁶⁵ Though strategic interests may have initially propelled the nuclear programs, and offer foreign policy justifications vis-à-vis deterrence of the USA, powerful constructivist motivations,

⁶⁴ Jacques Hymans. 'Of gauchos and gringos: why Argentina never wanted the bomb, and why the United States thought it did' International *Security*. *Studies*, 10, (2001), pp. 153–185; Robert Harney, Kevin Wood. 'Anatomy of a project to produce a first nuclear weapon' 2006 *Science*. *Global Security*, 14, (2006), pp. 163–182.

⁶⁵ Jo DJ, Etel Gartzke, 'Determinants of Nuclear Weapons Proliferation'. *Conflict Resolution*, 51, (2007), pp. 167–94.

taken advantage of by the regime currently governing, may have been the central reasons behind the North Korean nuclear policy. The regime is perceived to be radical by the west because of its many violations of the Nuclear Proliferation Treaty. It is still not enough to base assumptions on these factors alone. A more detailed debate will have to be executed in line with other relevant theories.

1.3 The Copenhagen Approach

The Copenhagen theory is regarded as relatively successful in modeling a political framework that has attracted a lot of attention in the field of international politics, as shown by the vast number of literature concentrating on its central assumptions of 'security' or some variation of it. Security in international relations has been useful in discussing a state's foreign policy model. The question of security is not a new phenomenon in international relations. In addition, the classical concept of security was orientated towards the state as the major referent. The theories of security all have various meanings on what should be protected or secured. Realism stresses the importance of the state a main unit to be securitized and protected from internal and external threats. However, the realists face criticism by other schools because the associate security as an offshoot of power thus minimizing the complex concept of security to just a mere identification with power. Security should not just be regarded as a state centric concept but should include all other elements with the state such a regime, civic organizations, the environment and human security. The concept of security as a limited field and one that had to be broadened beyond the scope of just

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⁶⁶ Potter Mukhatzhanova. 'The Role of Theory, An Introduction'. (New Jersey; McMillan Press; 2010), pp. 1–12.

⁶⁷ Chayes Hayes. *The New Sovereignty: Compliance with International Regulatory Agreements*. (Cambridge: Harvard University. Press;1995), pp. 23-34.

military centered.⁶⁸ Buzan therefore went further to elaborate the concept offering a more comprehensive view. This new approach incorporated perceptions that were not subsequently regarded to be part of the security nexus for instance notions of regional security, sociological and environmental subdivisions of security.

1.3.1 Levels of Security: States, Individuals and International Systems

It is significant to start by noting that there was a wide gap in the writing and publication of security as a concept. For a matter that seems to be recently on the public's mind, the advance to security and the particulars of the problem has been largely left vacant. Maybe this can explain why international security interpretations and analysis has been narrow prior to the Cold War. Barry Buzan sets out to fill this space and allocated security as an approach for international relations, as it is such an essential concept, the method of mapping it certainly takes great effort and insight.⁶⁹ Buzan's examination can be measured to be a loose bonding of neo-realism and the constructivism theory, mostly supporting constructivism. The international society as a social structure approach attempts to reveal the dynamics and engines or factors behind the international system rather than purse a plural or unitary method of analysis mostly found in realists and idealists.

Basing on this foundation, the differences with neorealism occurs, because realist definition of security as being a wholesome contest for power is outmoded, resulting in a myopic world view, and this only hinders the strategy makers or international

⁶⁸ Barry Buzan, "New Patterns of Global Security in the Twenty-First Century." *International Affairs* (1944-) 67, 3 (1991), pp. 431-451.

⁶⁹ Buzan, p. 230.

relations academics in coming to an inclusive understanding of the topic. As an alternative approach, Buzan discusses security offering three levels of analysis and five sections of security. This systematic flow originates in the English school of international relations and extends into aspects the Copenhagen theory. 70 The English school of international relations emphasizes the aspect of societies of states at the global level despite the presence of anarchy. 71 These societies operate through ideas rather than just material capacities and it is these ideas that shape the behavior of states in the system. The theory becomes associated with both constructivism on the social units of analysis and also with Copenhagen in regards to the types of ideas and sectors upon which states seek cooperation on. Security can be viewed on individual, state and international system level. This is then balanced by offering five sections of security which are environment based, economic issues, and politics based issues, societal and lastly military issues.⁷² The perceptions offered might not sufficiently deal with the question of security separately; they are each related creating a network in sequence that political experts should untangle to comprehend all the concepts so as to grasp how the notions influence each other in total. This narrow and broad style is something complex but is important in order to understand the depth of security. In the first level of analysis focusing on the individual, in order to fulfill this intricate study of security in which the state is assumed as the core referent, a question has to be asked with regards to the nature of a state when explaining security in terms of individuals, it can be argued that security may be measured as an aspect of life and

⁷⁰ Barry Buzan, *An Introduction to the English School of International Relations: The Societal Approach*', (Cambridge; Polity Press; 2014), p. 78.

⁷¹ Hedley Bull and Adam Watson, *The Expansion of International Society*, (New York; Pestle Press: 1984), p. 17.

⁷² Barry Buzan, *People, States and Fear: An Agenda for International Security Studies in the Post-Cold War Era.* Washington; Washington Press,1991), pp. 25-32.

its relative facets of freedom, status, wealth and health.⁷³

Threat as a concept can be understood on an individual level. As stated, the concept of security is not a narrow model, because individual security and national security are two different but related notions. Therefore, one can reflect on the character of the state in attempting to realize the security of larger and more vague units are nebulous in nature. A closer look at the nature of these elements one can tell that they can be turned into security related inquiries. By therefore studying them the broader picture of national security can be revealed in a more elaborative manner. The establishment of the interrelated network will help in coming up with answers to national defense policies.

1.3.2 Five security sectors

In order to understand the operation of the international system, a five-sector security model has been formed to act as a framework in the interpretation of global politics.⁷⁴ The military, political, economic, environmental, regional and societal sectors affect the periphery due to the changes at the center. What is of paramount importance is to realize that the five sections should not be investigated in a separated manner and they do not work in sole. Each sector describes a central point and helps to order priorities security issues. A more interesting argument is the link between the sectors and the concept of threats.

⁷³ Barry Buzan, "The 'War on Terrorism' as the New 'Macro-Securitisation'?" *Oslo Security Workshop*, (2006), pp. 1-25.

⁷⁴ Ole Waever, *Securitization and Desecuritization*. (New York: Columbia University Press, 1998), pp. 25-31.

1.3.3 Environmental, Economic and Societal Securities

The ecological, economic and societal sectors accompany the political and military securities and are more difficult to define. Threats of an economic nature are more challenging to study because of the complicated aspects of economics. The normal conditions portrayed by actors in a market based economy is one of danger, aggressive competition as well as vagueness, this apprehensive environment makes economic security tough to straighten out and how this ultimately affects international relations. The economic sector is also a clear illustration of how the dissimilar sectors work together with one another the significant relationship between economic and military securities. It is straightforward to see that they military sector is reliant on the economic sector due do budget limitations. In addition, economic security can be deemed to be a key pointer as to the universal security of a state. A comparison of developed or core countries and the developing periphery countries shows that where there is economic security, other sectors of security are relatively easier to develop. Hence a nation's economic security may determine its political and military policies in international relations.

Social securities are one of the most valued of all the other five segments of security. Disconnecting social security from political security is less academic since threats of a social nature are mostly linked to issues of national identity in any given nation.⁷⁶ Delicate countries are frequently less prepared to deal with differences in national identities and customs as opposed to strong states that have a strong identity and

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⁷⁵ Barry Buzan. "New Patterns of Global Security in the Twenty-First Century." *International Affairs*. (1991), pp. 431-451.

⁷⁶ Cirincione Wolfstahl, Rajkumar Midas. *Deadly Arsenals: Tracking Weapons of Mass Destruction*, (Washington, DC. New York: Columbia University Press: 1999), pp. 34-45.

culture. Societal perceptions including religious beliefs and nationalism therefore impact on type of government, policies and ultimately influencing a nation's foreign policy. It is evident that social related security matters are highly related to the politics as well as the military segments of security. The majority of international conflicts across the globe are mostly the ones with a societal category.⁷⁷ Conflicts were bound to happen due to differences in culture and civilizations which in turn determine threats, vulnerabilities and foes and allies.⁷⁸

It is consequently important to have more attention on these areas and put them into the study of security especially on global level. Nevertheless, due to differences of civilizations, the concept of social security might not be simple to put into investigation without running the risk of being critically one-sided. This can simply guide researchers and policy makers into political prejudgment and exclusion. The environment based security aspects are complicated to define and might be regarded as very elusive when compared to the other five segments. The threats facing humans today as a result of changes in the environment pose a real danger to the lives of a society. These threats range from global warming to the ruin of the ozone layer have led to alternative solutions that might be perceived as threats by other actors in the international system such as nuclear energy. All sections must be taken into account when examining domestic and global security, both in isolation and

Newey Gleny, *Routledge Philosophy Guidebook to Hobbes and Leviathan'*, (London, Routledge, 2008), p. 18.

⁷⁸ Samuel Huntington, 'The Clash of Civilizations and the Remaking of World Order', New York, Simon & Schuster, (1996), pp. 27-30.

⁷⁹ Matthew Finnemore, *National Interests in International Society*, (Ithaca, New York: Cornell University Press, 1996), pp. 12-23.

⁸⁰ Sunohara Campbell, 'Japan: thinking the unthinkable', *International Peace and Security*, 21, (2004), pp. 18–20.

collectively.

1.3.4 Regional Security

The conception of regional security was not sufficiently dealt with before Buzan. When investigating this aspect of security. Buzan is of the view that, security is a relative occurrence.⁸¹ Since security is relative, one cannot recognize the domestic security of a state without comprehending the international model of security dependence. There is friendship and hostility among states, thus relationships between states is determined by alliances or simply by anxiety. The subjects that can disturb a state's regional position in terms of policy range from issues such as national ideology, territorial identity, ethnicity, and history. Security complexes can be helpful in policy analysis and they also present an ideal framework to confer issues that are prevalent to a specific area. Possibly the most tremendous can be that of Israel and Arab nations. Israel and the Middle East security complex shows Israel's safety is connected to its regional position that is the Middle East. The opposite is also true, and in the end both sides take this complex into consideration when determining their national security policies. Regional security is an element of the hierarchy of the security dilemma, settled somewhere between domestic and worldwide security thus and cannot be left out of the equation. 82

A state's regional security is closely related to its position geographically and whether it perceives regional players as allies of foes. The aspect of security that

81 Buzan. People, States and Fear, Pp. 28-34.

⁸² Buzan, "New Patterns of Global Security in the Twenty-First Century", pp. 431-451.

could have determined the USA's a regional position in terms of policy ranges from issues such as nuclear policy, national ideology, territorial identity, ethnicity, and historical pattern. Regional security in terms of economic conditions might have contributed to need for nuclear program in some states as the region is one marked with under development and civil wars. A nuclear program offers massive opportunities economically such as jobs, developmental boost and more trade opportunities. Regional insecurity in terms of military threats has also a side effect on countries. Nuclear weapons programs offers a security deterrent that protects a state in cases of attacks which could be one of the reasons why the state has a nuclear program however such a capability might be perceived hostile by other states hence becoming a security threat in the region. The former aspect includes issues to do with technical capabilities in relation to the supply of nuclear materials and equipment. On the other hand, the nation need to have a nuclear program is categorized under the demand side of nuclear proliferation.

⁸³ Barry Buzan, *The War on Terrorism as the New 'Macro-Securitization?* (Oslo; Oslo Press, 2006), pp. 1-25.

Kurt Campbell, *The Nuclear Tipping Point: Why States Reconsider Their Nuclear Choices*, (Washington, DC: Brookings Institute; 2004), pp. 20-23.

⁸⁵ Scott Sagan, 'Why do states build nuclear weapons? Three models in search of a bomb'. *International. Security Review*, 21, (1996), pp. 54–86.

CHAPTER II

SUPPLY AND DEMAND ON NUCLEAR PROGRAMS

2.1 Nuclear proliferation

The world is more alert to the spread of nuclear weapons than ever before. Iran was accused of likely pursuing a nuclear weapon but the reasons for such a motivation are hardly known if ever stated. Having been placed under the UNSC, Iran continues its argument that is does not seek a nuclear bomb. Rather Iran claims to be following the program for civilian motives to generate electricity and control global warming. The relationship between civilian nuclear power and military weapons is not quite clear. Academics have increased their interest in understanding motivations for a nuclear program. The former aspect includes issues to do with technical capabilities in relation to the supply of nuclear materials and equipment. On the other hand, a nation need to have a nuclear program under the demand side of nuclear proliferation. The former aspect includes is not equipment.

2.2 Background on Nuclear Programs

As from 1945 to 2016, nuclear programs initiated by states steadily rose although the increase was somehow slow. During that period, about one new atomic weapons state arose at the turn of every five years with the exception of South Africa and three former Soviet states that inherited the weapons. These exceptions did not develop operative technical competences.⁸⁸ There is no disagreement about which

⁸⁶ James Acton. 2009. 'Nuclear power, disarmament, and technological restraint. Survival' *Global Peace Review*, 51, (2009), pp. 101–126.

⁸⁷ Scott Sagan, 'Why do states build nuclear weapons? Three models in search of a bomb.' *International. Security*, 21, 3, (1996), pp. 54–86

⁸⁸ Lawrence Scheinman, *International Atomic Energy Agency and World Nuclear Order*, (Washington, DC: Resource Future Press, 1987), pp. 5-9.

states pursued nuclear weapons but there are debates about when exactly did some states initiate their weapons program. These states are North Korea, Israel, Pakistan and India. The major challenge is to identify when a state is pursuing a nuclear weapons program, or at least planning to execute such a program since states possess sovereignty over their territories thus nuclear development programs may easily be concealed.⁸⁹ Hence it is crucial to investigate why some states seek a nuclear weapons program.

Soon after the end of the World War II there was a balance of power between the West and Eastern bloc and this help in avoiding the use of nuclear bombs. The result was the adoption of strategies arising out of fear during the Cold War. This became popularly known as the Mutually Assured Destruction Doctrine (MADD). This balance of power was very important in that it led to the signing of the Anti-Ballistic Missile Treaty (ABMT) in 1972 between the USSR and the USA to prevent further research and production of such missiles capable of transmitting a nuclear bomb. The MADD principle led to nuclear proliferation as both side aimed at increasing its stock pile to make sure that they had the capacity to defeat their opponent in any given situation.

During the Cold War, several lesser powers started to purse nuclear weapons for reasons not related to the USA, Soviet Union and Chinese antagonism. In 1962 India advance the research and development of nuclear weapons after the border conflict with the Chinese. In 1974 India tested a nuclear device described as peaceful

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⁸⁹ Benjamin Schiff, 'International Nuclear Technology Transfer: The Dilemmas of Dissemination and Control'. 1984. Totowa, NJ: Rowman Press, pp. 43-44.

⁹⁰ Nina Tannenwald, 'The Nuclear Taboo: The United States and the Non-Use of Nuclear Weapons'. 2007. Cambridge Inc. p. 23.

explosion. 91 As a result Pakistan was provoked by the India nuclear program and they launched a nuclear research scheme. The two countries went on to test several nuclear devices in the late 1980s which caused the international community assume that a nuclear war was imminent between the two countries.

In 1996 former Soviet bloc states, such as Ukraine, Belarus and Kazakhstan submitted their nuclear warheads to Russia. 92 South Africa developed a uranium program to develop nuclear weapons only to halt the scheme in the early 1990s. It is not clear if South Africa tested nuclear devices but the state noted that they had manufactured some devices with nuclear capability. Israel is alleged to have a nuclear arsenal with hundreds of atomic warheads. The only challenge is this allegation has not been refuted or confirmed officially. North Korea made it official in 2003 that they had a number of nuclear weapons devices and this announcement was met with doubts. However, in 2006 North Korea went on to test the first nuclear weapon violating the UNSCR 1718.93 Therefore it can be noted that the nuclear program is not unique to Iran but several other states had an active interest in pursuing nuclear weapons.

2.3 The Supply-Side Literature on Nuclear Programs

What kind of information can be used to assess if a state is capable of developing a nuclear weapons program? Researchers can use guideline to determine a state's

⁹¹ Alexander Montgomery and Sagan Scott. The perils of predicting proliferation. In Causes and Consequences of Nuclear, (Washington, Washington Inc, 2011), p. 17.

Mathew Meyer, The Dynamics of Nuclear Proliferation. (Chicago: University. Chicago

Press:1984), pp. 23-24.

⁹³ United Nations Security Resolution 8853, http://www.un.org/press/en/2006/sc8853.doc.htm retrieved 14 November 2016, p. 45.

nuclear ambitions.⁹⁴ Nuclear proliferation experts utilize Meyer's (1984) ground-breaking work *The Dynamics of Nuclear Proliferation* and Stoll's (1996).⁹⁵ Meyer (1984) came up with a set of ten mechanical based and financial orientated indicators.⁹⁶ These can be summarized as the domestic mining conditions, presence of locally sourced uranium deposits, and availability of metallurgy experts, steel manufacturing industry, construction teams, biochemical experts and skilled physicists to determine whether a nation had latent capacity to produce nuclear weapons. This work might explain why states such as Iran pursue nuclear weapons.

It remained challenging to assess whether the availability of nuclear engineers as well as nuclear related materials could determine if a state was capable of forming a nuclear weapon. Meyer introduced two more standards to deal with this gap: First by checking if the government was working on a nuclear research program for periods up to three years and this would be a substitute for the atomic expert skills. Secondly if a state had mass production of vehicles and factory manufactured radios or televisions; this substituted the skills needed for explosive making and electrical engineering as such a country had a capacity to deliver that already. Using this standard Meyer concluded that about 34 states had the capability to initiate and develop nuclear weapons in 1982.

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⁹⁶ Meyer, p. 34.

⁹⁴ Scott Sagan, *The Causes of Nuclear Weapons Proliferation*. (Stanford University, Stanford, California: 2011), p. 45.

⁹⁵ Richard Stoll, *World production of latent nuclear capacity*. 1996. http://es.rice.edu:80/projects/Poli378/Nuclear/Proliferation/proliferation.html retrived 10 october 2016, p. 13.

Stoll introduced a new element in the standard of analysis while Meyer had focused on locally sourced uranium bases. All states had access to nuclear resources stating that all states had access to nuclear materials in an international marketplace and those could be obtained easily. Based on such notions Stoll noted that 48 nations have a dormant nuclear capacity. A regime might not produce a nuclear weapon unless is has highly enriched uranium obtained from its own local reactors. Thus even if any state might obtain nuclear materials, a few can actually enrich the uranium into weapons grade materials. Therefore, Stoll's conclusions are fundamentally inconsistent with this mechanical restriction.

In short by focusing on the supply side literature one can tell that a state's desire to have a nuclear bomb is related to the supply of nuclear materials and technical expertise needed to manufacture the bomb. This determines if a country has a mechanical capacity to develop a bomb. The broader question is not about why so many nuclear capable states did not produce weapons but rather why few states have developed or showed an interest in setting up nuclear facilities and machinery required to enrich uranium and the recycling of plutonium. It is worthwhile to note that nuclear proliferation is associated with availability of capital and avenues of trade allowed under international commerce.

The spread of nuclear weapon is strongly tied with the supply of technology and materials. Nuclear trade offers both materials technology. Global supply of nuclear

⁹⁷ Richard Stoll, World production of latent nuclear capacity. (Chicago; Fordham Press, 1996), pp. 7-

^{9.} Sasikumar Way. *Testing theories of proliferation in South Asia: Inside Nuclear Programs*, (Stanford, CA: Stanford University. Press; 2009), pp. 61-66.

related support aids in fast-tracking the spread of nuclear weapons. ⁹⁹ Kroenig describes such nuclear support to be aid of a structural and sensitive nature by allies providing a potential nuclear state with nuclear ingredients that will be used to manufacture the weapons. Three states that produced nuclear weapons after being offered nuclear support and resources from allies are Pakistan, China and Israel. ¹⁰⁰

Kroenig discovers that international nuclear assistance can be associated with the development of nuclear programs by a state and the support can be in the form of technical or financial resources. 101 This is further supported by the state's gross national product, industrial base of the state and the type of regime undertaking the nuclear programs. A new question emerges as to why would states trade or offer sensitive nuclear assistance to other states given the fact that this would without doubt allow for the spread of nuclear weapons. Most experts tend to conclude that national interest fosters unity amongst allies and most regimes do this for the monetary benefits as a trading strategy. This is usually the case notwithstanding, the expected proliferation costs. Governments such as Russia and Iran which are allies are also more likely to offer complex nuclear technology or support to other regimes where the perceived opponents of the assisted regime are also regarded as foes of the supporting regime. The conclusion of such states might be that the perceived foes of their foes might be a good customer. The spread of all kinds of civilian nuclear equipment contributes to overall nuclear advancement. 102 Fuhrmann argues that: the traditional understanding is rather incorrect since all types of civilian nuclear aid will

⁹⁹ Mathew Kroenig, 'Exporting the bomb: sensitive nuclear assistance and proliferation' *Brookings Political Science Review*, 103, (2009), pp. 113–133.

¹⁰⁰ Kroenig, 'Importing the bomb: sensitive nuclear assistance and proliferation', pp. 81–85.

Mathew Fuhrmann, 'Spreading temptation: proliferation and peaceful Nuclear Cooperation Agreements' *International Security*. 34 (2009), pp. 7–41.

by default raise the risk of nuclear proliferation. Peaceful nuclear programs and the militarization of nuclear weapons are usually interrelated since it takes almost the same skills and equipment to enrich uranium.

According to Fuhrmann, the majority of nations that have openly declared civilian nuclear assistance and programs have not manufactured weapons. ¹⁰³ However, he notes that there is a strong relationship between the number of nuclear collaboration arrangements (NCAs) and the prospect that a state might end up initiating a nuclear weapons program ultimately developing a bomb. Nuclear collaboration highly determines if a state will pursue a nuclear weapons program or not. A state participating in one or more nuclear cooperation arrangement has a 500% likelihood of developing a bomb. Fuhrmann's fundamental argument that a regime may start on a civilian nuclear program but then turn towards the militarization of nuclear materials when regional threats appear is an important one. ¹⁰⁴ The debate is around NCAs which might end up inspiring state into nuclear research and exploration. Does this therefore mean that NCAs are catalysts in nuclear proliferation? While NCAs might encourage states to look into nuclear programs, it takes more than just NCAs for a start to be interested in the militarization of nuclear materials.

There is a relation between NCAs and actual nuclear programs carried out by a state. India, Israel and Pakistan openly confirmed that they had received considerable nuclear assistance after they were already investigating nuclear programs. ¹⁰⁵ In this

¹⁰³ Mathew Fuhrmann, 'Taking a walk on the supply side: the determinants of civilian nuclear cooperation'. *Journal of Conflict Resolution*, 53, (2009), pp. 181–208.

¹⁰⁵ Sonali Singh, Way Christopher. "The correlates of nuclear proliferation: a quantitative test" *Journal of Conflict Resolution*, 48, (2004), pp. 83–85.

case NCAs acted as catalysts speeding up an already existing program. North Korea on the other hand got support from Russia the then former Soviet Union at the same time the state started exploring nuclear materials. Out of these states only South Africa got assistance before it showed any interest in nuclear weapons in 1969. This support was granted in the mid-1950s just before the NPT system was founded.

2.4 The Demand-Side Literature on Nuclear Programs

The collected works on nuclear proliferation explains why states are attracted to nuclear programs. One important aspect of these works is the aspect which explains the demand-side of nuclear proliferation. Diverse state actors are investigated in their role as having contributions in the demanding of a nuclear weapons case. These policy makers determine the national defence policy such as the nuclear policy the state will have in the region and globally.

Solingen's 1994 work "The Political Economy of Nuclear Restraint" argued that governments pursing economic development are more likely to accept regional nuclear governments seeking peaceful nuclear energy as opposed to the inward-orientated, radicalized and nationalistic regimes that are more likely to perceive nuclear development as a threat to their security. Sagan's work titled "Three Models in Search of a Bomb" outlined security pressure, domestic political will and international laws on the spread of nuclear weapons as having a determinative effect

¹⁰⁷ Richard Stoll. World production of latent nuclear capacity. (Chicago; Fordham Press, 1996), p. 12.

¹⁰⁶ Etel Solingen, *Nuclear logics: contrasting paths in East Asia and the Middle East'*, (Princeton, New Jersey: Princeton University Press, 2007), pp. 23-27.

¹⁰⁸ Etel Solingen, *The political economy of nuclear restraint*. 1994.(Chicago; International Security Press, 1994), p. 69.

on nuclear proliferation. ¹⁰⁹ Security pressure usually emanates from the military inspirations of the top generals and political elites. Secondly domestic political will includes political class both the elected and administrative class who act to back or disrupt calls for nuclear weapons using legislation. Lastly international law focuses on customs and statutes that can promote or discourage the attainment of nuclear weapons. Sagan developed a strong support on the security model that a military sector promoting or pushing for nuclear weapons would result in a state initiating a nuclear weapons program. ¹¹⁰ On the other hand, domestic administrative support and moral society backing were sufficient though not mandatory conditions for establishing nuclear weapons.

Three case-study situations in North Korea, Iran and India concentrate on the intentions and tactical inclinations of both the administrative and political leaders. ¹¹¹ It will be particularly respected, consequently, for forthcoming investigators to examine these models more extensively. The secrecy of nuclear weapons programs has led researchers (such U.S. intelligence experts) to investigate whether nuclear installations and equipment are for peaceful use or military basis. This problem called nuclear ambiguity questions whether the administration is seeking nuclear weapons or it is not. ¹¹² On the other hand, nuclear opacity is the regime using civilian nuclear programs to hide its real purpose? Political leaders may not have an intention or well-planned nuclear policy. The political leadership may act under calls from

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¹⁰⁹ Scott Sagan, *Rethinking the causes of nuclear proliferation: three models in search of a bomb. In the South Asia*, (Stanford, CA: Stanford University Press, 2008), pp. 13-17.

Scott Sagan, Why do states build nuclear weapons? Three models in search of a bomb, (Chicago; International Security Chicago Press, 1997), pp. 54–86.

¹¹¹ Maria Rost Rublee, *Non-proliferation Norms: Why States Choose Nuclear Restraint*, (Atlanta: University. Georgia Press, 2009), pp. 90-98.

¹¹² Davis Zachary, 'The realist nuclear perspective,' *Morris International Security Studies*, 20, (1993), pp. 79–99.

other groups driving for either nuclear arms or for nonviolent civilian energy. This is determined by a wide variety of political and community conditions that appear usually after the leadership has opened up dialogue on nuclear programs.

An example is the case of India after the state pursed a nuclear bomb from 1945 to 1998. The need for political independence was seen as a "strategic enclave" by the pro-bomb administration officials under the India nuclear institution Nuclear reduction regulations trying to stop hesitant actors avoid doing what they have no intention to actually do might end up as counterproductive resulting in a state or administrative resistance to external controls. Realism claims that most political leader require a bomb mostly for security reasons but in actual fact few leader actually desire to have one since this is revolutionary decision and leap into the unknown. The leaders usually do not know if this decision will be well executed by the construction sector or worse what the potential out of the move might be to home land security.

Lastly, Solingen's Nuclear Logics: Contrasting Paths in East Asia and the Middle East deliberates the nuclear behaviour of countries in those two regions, which had like potentials in the initial 1970s but have then experienced dissimilar nuclear tracks. Solingen's concentrated regional contrast approach uses thorough case revisions in order to exam her chosen model-a "global integration" prototype that emphases on the grade to which the regime centres its internal political endurance on

¹¹³ Malfrid Braut-Hegghammer, *Nuclear entrepreneurs: drivers of nuclear proliferation*, (London; London School Economics. Political Science Press, 2009), pp. 90-98.

¹¹⁴ Abraham Itty, *Contra-proliferation: the Indian bomb and nuclear developmentalism*, (Chicago: Free Press, 2009), pp. 30-32.

¹¹⁵ David Albright, *Peddling Peril: How the Secret Nuclear Trade Arms America's Enemies*, (New York: Free Press, 2010), pp. 12-13.

commercial assimilation into the international economy-against other theories. The strong point in Singh & Way's (2004) work is the study on the relationship between economic status of a state and nuclear propagation. A state with stronger GDP and sound trade percentages is more capable of exploring, initiating and developing nuclear weapons. This is important because of the cost involved in nuclear development. Such an economic incentive might act as an enabling factor. Commercial development is of paramount importance however this statement was still unclear since there are countries with strong GDP and trade balances like Australia and Canada but have no nuclear weapons. Thus, economic development is not completely a cause factor in nuclear propagation.

2.5 The NPT, Regime Type, and Nuclear Proliferation

Since the Nuclear Proliferation Treaty lacks sound controls to halt the spread of nuclear weapons there is need to understand state intentions in having nuclear weapons. Regime type has more to do in nuclear proliferation as it is the one on both the supply and demand side. Thus, if the NPT is to be effective regulation policy should be at both the demand and supply side. Any regulator tool that seek to reduce or prevent the spread of nuclear weapons has to be focused on the regimes in practise to question if more states would have gone for nuclear weapons if the treaty was implemented. Some scholars such as Betts disagrees with the legalist outlook of the NPT stating that even if contracts are valuable it remains a delusion to regard them as complete solutions. The NPT and CTBT (Comprehensive Test Ban

¹¹⁶ Etel Solingen, *Nuclear logics: contrasting paths in East Asia and the Middle East'*, (Princeton, New Jersey: Princeton University Press, 2007), p. 20.

¹¹⁷ Solingen Nuclear *logics*, p. 34-40.

¹¹⁸ Richard Betts, *Universal deterrence or conceptual collapse? Liberal pessimism and utopian realism. In the Coming Crisis: Nuclear Proliferation, US Interests and World Order*, (Cambridge, MA: MIT Press, 2000), pp. 51–85.

Treaty) reveal the intention of their supporters to shun nuclear-powered weapons. 119 Others states where signatories of the NPT only to cheat on their obligations such as North Korea and Iraq. In the event that the NPT or the CTBT could avert nuclear proliferation, there would have been evidence of this of at least one state that tried to acquire weapons but failed due to the effect of the treaties.

Betts's account is outdated. He overlooks how many countries not regarded as "problematic" now were once dreaded probable nuclear proliferators before. A 1963 Robert McNamara Defence Department statement projected that eight states might purse nuclear-powered weapons by year 1973: These are Sweden, West Germany, Japan, Israel, Australia, South Africa, India and China. 120 Egypt was regarded to hold a modest incentive and a capacity to develop nuclear weapons. This brings up the question of regime type. Democratic nations and undemocratic states are regarded as similar in their nuclear policies. Majority of the cases have democratic states been nuclear powers such as the USA, Germany and France than non-democratic states. Regime type has no much impact on whether a state becomes nuclear or not. Democratic states were more likely to have pursue nuclear programs than autocratic states. 121 However this is not accurate since nuclear policies are made by states therefore regimes are important units of study in the nuclear debate. He argues that this is a result of two reasons; democratic states are more loyal to nationalist pressures and secondly democratic states use nuclear programs as a diversion of national domestic reasons.

¹¹⁹ Bowen Wayne, Libya and nuclear proliferation: stepping back from the brink, (Adelphi, Illinois Press, 2006), pp. 3-5.

¹²⁰United States Ministry of Defence, *Defence Policy Report*, (2014), p. 24. http://history.defense.gov/Portals/70/Documents/special_studies/SpecStudy5.pdf . Obtained 15 May

¹²¹ Jo DJ, Erik Gartzke, 'Determinants of nuclear weapons proliferation". Journal of Conflict Resolution, 51, (2007), p. 94.

Democratic acceptance of nationalist pressures may be an attempt to seek acceptance from the citizens and preserve power. 122 In the same light argues that advanced democracies are associated with nuclear weapons attainment as they have high probability that they fall under demands of nationalist forces. There is also a cause effect relation on the NPT and Nuclear Weapons States (NWSs) since the latter usually find it better not to give nuclear support to their allies considering other NWSs do not also provide support to their allies. Article I of the NPT seeks to maintain this shared nuclear control obligation. ¹²³ On the extreme end the Non-Nuclear Weapons States (NNWSs) regard themselves safe if or unnecessary to pursue nuclear weapons provided other (NNWSs) are restraining or showing no interest in nuclear weapons. This guarantee is offered by the IAEA and Article II regulations. Thus in this respect the NPT encourage accountability in the use of civilian nuclear programs and facilities. The IAEA has a regulatory regime in place that seeks to discourage actors from follow a bomb path. The possible measures against offenders could be substantial financial cost if a regime was suspected of having a clandestine nuclear weapons program.

More research is needed to assess the aspect of regime type in nuclear development. Democratic nations usually have no double standards in their nuclear programs as they have more transparency and accountability allowing for even international inspections. Questions have been raised concerning conduct of democratic nations and their defence policy. In general, are democratic states more disciplined in their treaty obligations or they simply chose to be loyalists of international nuclear law?

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¹²³ Delegation to the Nuclear Review Conference. United States Nuclear Policy Framework. *Treaty on Nuclear Proliferation*, (2010), p. 5. http://www.state.gov/documents/organization/141503.pdf obtained 22 August 2016

To answer this question one has to understand the formation of democratic states. The leaders seem to be more sensitive the democratic audience who have a power to chastise them in elections by voting them out if they are seen to be deviating from their nuclear obligations. The way democratic states are governed gives one a clue as to why. This might not be the case with undemocratic states as they are not usually answerable to the citizens such as North Korea and the way the regime is formed is not a direct result of free choice but manipulation and government control. Citizen has very little power to none in shaping the behaviour of the leadership. 124

Patrimonial and religious regimes as well as empire like regimes characterized by high regulation and censorship, lack of accountability in the form of checks and balances will likely be more prone to nuclear proliferation. There is need to have more study in the field of nuclear proliferation. This investigation should take into account regime type, regional location, domestic administrations and their foreign policies. By combining the demand and supply side more answers can be obtained as to why states pursue nuclear weapons. The two side of nuclear proliferation should not be investigated separately but should be linked in case studies. Both these side will reflect how determined a regime will work towards a nuclear program.

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¹²⁴ Benjamin Frankel, *Opaque Nuclear Proliferation: Methodological and Policy Implications*, (London: Frank Press, 1991), p. 23.

¹²⁵ Jeck Hymans, 'Of gauchos and gringos: why Argentina never wanted the bomb, and why the United States thought it did'. *Security Studies*, 10, (2001), p. 85.

¹²⁶ Jeck Hymans, *Proliferation implications of Atoms for Peace: a case study of the Yugoslav experience*, (Oscarsborg, Drobak, Norway Press, 2009), pp. 25–27.

CHAPTER III:

THE CASE OF IRAN

3.1 Iran Nuclear Development 1950s and 60s

The Iranian nuclear program was initiated by the Shah of Iran, Mohammad Reza Pahlavi who was the former supreme leader around late 1950s. ¹²⁷ In 1957 a nuclear cooperation agreement was finalised as an accord under the Atoms for Peace Arrangement. In 1960 and agreement was concluded to acquire small 5MW reactor for nuclear research at the Tehran University. The former USA President Eisenhower initiated the Atoms for Peace program at UN in 1953. ¹²⁸ The purpose of the agreement was to formalise the international atomic energy agency allowing the utilisation of nuclear materials for civilian purposes. A special function of nuclear program was to introduce nuclear energy to parts of the world that was in need of such a resource. Iran therefore developed cooperation ties with other developing countries on nuclear development. In 1967 the USA provided Tehran's research reactor with highly enriched uranium. The following year Iran signed the Non-Proliferation Treaty on the day of the signature call.

3.2 Iran pursues nuclear power 1970s

In 1974 the Shah of Iran setup the Iran Atomic Energy Organization which set the official announcement of a comprehensive ruthless nuclear development program that saw the development of over 20 nuclear powered reactors. That would eventually include over 20 nuclear power reactors. ¹²⁹ Major western powers such as

¹²⁷ Jeck Hymans, *The study of nuclear proliferation and non-proliferation: toward a new consensus?* (New York; Mukhatzhanova Press, 2010), pp. 13–37.

¹²⁹ Richard Rauchhaus, Michael Kroenig, Etel Gartzke, *Causes and Consequences of Nuclear Proliferation*. (New York: Routledge Press, 2006). pp. 23-26.

Germany, France and the USA actively supported the Iranian nuclear program as they sought purchase deals with Iran. There were claims by Geoffrey that Iran's nuclear program has military motives and this was because of potential threats from the Soviet Union, Iraq, Iran, Pakistan and India.

3.3 The Shah's nuclear ambitions

In the year 1974, The Shah stated that Iran would obtain nuclear weapons sooner and definitely without fail according to the Nuclear Threat Initiative 2004. ¹³⁰ Iran leaders later withdrew those remarks and the Shah stated that Iran will not seek a nuclear weapon. This was backed by a policy statement in 1975 that Iran would only consider its nuclear policy if smaller states began developing nuclear weapons. Akbar the founder of the Atomic Energy Organization of Iran (AEOI) stated in an interview that he had spoken to the Shah in the mid-1970s where he was told that the Shah would not build a nuclear weapon because this would isolate Iran and prevent the state from obtaining nuclear technology. ¹³¹ However the Shah went on to state that Iran's nuclear policy will shift from civilian to military if other countries begin the process of acquiring nuclear bombs. Akbar therefore created a special research team to allow Iran to access all nuclear equipment and technologies thus allowing the policy makers the ability to make necessary decision be it for a bomb of not without being detected.

Prior to the revolution in Iran the state was governed by Shah Pahlavi. He had warm relations with the west and he obtained military and financial support. Before 1979

¹³¹ Bluth Christopher and Fuhrmann Mathew. 'Correspondence: civilian nuclear cooperation and the proliferation of nuclear weapons'. *International Security Studies*, 35, (2010), p. 200.

France and Germany greatly supported all sectors of the nuclear program in Iran. The USA invested quite a large amount of money into the nuclear program also however they had restrains concerning the policy of non-proliferation after World War II and the disaster in Hiroshima and Nagasaki. The US was not sure about the real intentions of the Shah concerning the nuclear program. The former USA President Eisenhower signed a nuclear cooperation deal with Iran for civilian purposes as a section of the 'Atoms for Peace' plan crafted by the USA to utilise nuclear materials for peaceful and not military purposes.

Thus, states would obtain access and support to nuclear research and energy in the event that they let go any ambitions to acquire nuclear bombs. ¹³³ This agreement later became known as the Cooperation Concerning Civil Uses of Atoms. Iran became a signatory of the NPT on the 1st of July 1968. As obtained by the Brookings Institute, the AP program was the bedrock foundation upon which Iran received important nuclear expertise and technological support. ¹³⁴ The program was commenced with the launch of a nuclear reactor meant for research under the Tehran Nuclear Research Centre. ¹³⁵ The program was executed for more than a decade from the early 1970s which led to The Shah of Iran setting up the Atomic Energy Organization of Iran (AEOI) increasing the nuclear budget from \$30 million to over \$1 billion. The AEOI had several training protocols signed including with Massachusetts Institute of Technology (MIT) which trained several nuclear scientists

¹³² Malfrid Braut-Hegghammer, *Nuclear entrepreneurs*, p. 78.

Abram Chayes, Antonia Chayes, *The New Sovereignty: Compliance with International Regulatory Agreements*. (Cambridge, MA: Harvard University. Press, 1995), p. 13.

John Krige, 'Atoms for Peace, Scientific Internationalism and Scientific Intelligence' *Political Science Review on Security*, *35*, (2006), p. 12.

http://faculty.georgetown.edu/khb3/Osiris/papers/Krige.pdf .Obtained 24 October 2016.

¹³⁵ Jeck Hymans, *The study of nuclear proliferation and non-proliferation: toward a new consensus?* (New York; Mukhatzhanova Press, 2010), p. 40.

at Masters Level. Kraftwerk Union a Germany based company signed a cooperation deal to establish Bushehr's two nuclear reactors.

Internationally the Shah had initiated a deal which would see Iran possessing 11% stake at an enrichment facility comprising several other states. At that time, Iran made a \$1 billion exchange deal in return Iran would obtain highly enriched uranium from the Eurodif centre. Thus, the centre somehow acted as a provider of nuclear materials at the same time preventing the proliferation and exchange of nuclear machinery. Up to date Iran possesses 11% stake however France had rejected Iran from obtaining it since the 1979 Islamic Revolution. 136

3.4 1979-1988 the Iranian Revolution

In 1979 the Shah's unpopular regime was removed which saw Ayatollah Khomeini return from exile and he established an Islamic Republic. The regime went on to cancel the Shah's nuclear program and declared it 'un-Islamic'. The reaction of the Western states was one of suspicion as to what the real ambitions of Khomeini were. Hence the west imposed sanctions restricting Iran from accessing nuclear technical support and nuclear materials. The coming into power of the revolutionary Islamic regime led to the end of the USA nuclear participation in the Iran nuclear program in 1979. The human cost of the Iran-Iraq war motivated the regime leaders to seek a stronger nuclear deterrent. Iraq attacked Iran using chemical weapons and Iran was under a US arms embargo. The Iran-Iraq war led Iran to have a stronger defence

¹³⁶ Anne Lavergeon, 'The nuclear renaissance: an opportunity to enhance the culture of non-proliferation,' *Nuclear Review Journal*, 138, (2009), pp. 91–99.

¹³⁷ Stephen Meyer, *The Dynamics of Nuclear Proliferation*, (Chicago University; Chicago Press, 1984), pp. 34-36.

policy and this led the state to realise how vulnerable they were. ¹³⁸ In 1988 Hashemi Rafsanjani, former speaker parliament, suggested that Iran should develop nuclear and modern weapons as a result of the war time experiences with Iraq which led to chemical attacks on the Iranian army. Rafsanjani stated that they should fully equip ourselves both in the offensive and defence use of chemical, bacteriological, and radiological weapons according to Middle East Defence News article 1991.

3.5 The Factors behind Iran's Nuclear Program

The west might have their reasons to be concerned about Iran's nuclear program. The question to ask now is what Iran's nuclear motivations and what are the forces behind these ambitions. Iran's number one foe the USA practised a containment policy against Iran so as to limit the nuclear development in Iran by putting economic and political sanctions and also backed regime change groups aimed at overthrowing the Iranian regime even through forceful means. Iran has therefore security concerns as a counter containment method by developing nuclear weapons. After being accorded a position in the USA "axis of evil" Iran is a vulnerable target in the region especially from nearby the USA military installations. 139

The late 1970s saw the change in Iranian politics and its status in the region. The proceeding folly by the USA of backing Saddam Hussein against Iran was one event that set Iran defence and foreign policy for years to come. Saddam ended up using chemical weapons against Iran and also invading Kuwait because of the USA

¹³⁹ Benjamin Schiff, *International Nuclear Technology Transfer: The Dilemmas of Dissemination and Control*, (Totowa, New Jersey: Rowman & Allan held Press, 1984), p. 34.

¹³⁸ Richard Perry, *Rogue or Rational State" A Nuclear-Armed Iran and U.S. Counter-proliferation Strategy*, (London; Air Command and Staff College Press, 1997), pp. 18-20.

¹⁴⁰ Scott Sagan, Why do states build nuclear weapons? Three models in search of a bomb, (Chicago; International Security Chicago Press, 1997), pp. 54–86.

backing. On the other hand, if Iran had nuclear weapons it would remove nearby the USA threats to Iran. This definitely changed Iran's thinking about possessing nuclear weapons due to sense of insecurity in the region and global political system. The perception of having a nuclear bomb was regarded as useful in maintains the sovereignty of the country. Iranian leadership perhaps thought that a nuclear weapons program would be a source of strategic deterrence in the event of the USA attack on Iran.

Another significant reason why Iran seeks nuclear weapons is the issue power and influence in the Persian Gulf. The weakening of Iraq and the possibility of instability in Saudi Arabia, Iran becomes a more favourable candidate to occupy a prestigious place in the region. ¹⁴¹ Thus Iran with nuclear weapons can have more leverage in a contest of power and influence. Sagan's 1996 work titled "Three Models in Search of a Bomb" outlined security pressure, domestic political will and international laws on the spread of nuclear weapons as having a determinative effect on nuclear proliferation. Security pressure emanated from the military inspirations. Iran's military administration is regarded to be a patriotic wing of the state that played serious role in the war against Iraq. The demand by this wing to have a more capable defense mechanism might explain why Iran purses nuclear weapons. A military sector promoting or pushing for nuclear weapons would result in a state initiating a nuclear weapons program Secondly domestic political will include political class both the elected and administrative class who act to back or disregard calls for nuclear weapons using legislation. The Iranian presidency as well as legislature has

¹⁴¹ Beth Simmons, 'Compliance with international agreements", *Political Science Review*, 94, (2000), p. 35.

over the years passed various pieces of laws legalizing nuclear research and development since 1970s. 142

The 1979 revolution which overthrew the Iranian monarchy saw the country been run by a Shia Islamic government. Ayatollah Ali Khamenei is the state's Supreme Leader and the uppermost authority in the Republic of Iran. He makes major policy decisions including foreign and defense policy covering nuclear development. Such a backing by such a profound figure explains why Iran is also pursuing nuclear weapons. Thus domestic administrative support and moral society backing are sufficient though not mandatory conditions for establishing nuclear weapons. Lastly international law focused on customs and statutes that can promote or discourage the attainment of nuclear weapons such as the NPT protocol allows states to have peaceful nuclear capabilities according. Hence Iran might be leveraging the statures of the NPT as a signatory or in the worse-case scenario; Iran might be using the NPT to hide its weapons program.

Researchers can use guidelines to determine Iran's nuclear ambitions according to nuclear proliferation experts utilise Meyer's ground-breaking work *The Dynamics of Nuclear Proliferation*. ¹⁴⁴ Meyer came up with a set of ten mechanical based and financial orientated indicators. These can be summarised as the domestic mining conditions, presence of locally sourced uranium deposits, and availability of metallurgy experts, steel manufacturing industry, construction teams, biochemical

¹⁴² Scott Sagan, Nuclear latency and nuclear proliferation, (Chicago; Potter Press, 2010), pp. 13–37.

¹⁴³ Sonali Singh, Christopher Way, 'Correlates of nuclear proliferation: a quantitative test', *Journal of Conflict Resolution*, 48, (2004), p. 85.

¹⁴⁴ Stephen Meyer, *The Dynamics of Nuclear Proliferation*, (Chicago; University of Chicago Press, 1984), p. 22.

experts and skilled physicists to determine whether a nation had latent capacity to produce nuclear weapons. This work might explain why states such as Iran pursue nuclear weapons. Iran is believed to have highly sophisticated metallurgy experts and large reserves of uranium deposits locally available. Its highly-developed manufacturing industry also works as a starting point in the development process of nuclear materials. Due to these supply-side resources Iran, can easily be enticed into pursing nuclear weapons because the state possesses all the much-needed materials and knowhow to start such a sensitive process. The global supply of nuclear related support aids in fast-tracking the spread of nuclear weapons.¹⁴⁵

Such kind of nuclear support can be viewed as structural and sensitive by allies providing a potential nuclear state with nuclear ingredients that will be used to manufacture the weapons. This applies to three states that produced nuclear weapons after being offered nuclear support and resources from allies: These were Pakistan, China and Israel. Kroenig discovers that international backing from Russia, North Korea, Brazil and China of the Iran nuclear industry is therefore associated with the state's nuclear ambition. This is further supported by the Iran's gross national product, industrial base and the Iranian regime undertaking the nuclear program. This makes an interesting assumption that states such as Iran with international nuclear assistance or local capacity are more likely to develop a nuclear weapons program. In the end, it can be noted that there are various driving forces behind Iran's nuclear development. However they all fall under demand and supply side.

¹⁴⁵ Mathew Kroenig. 'Importing the bomb: sensitive nuclear assistance and proliferation' *Brookings Political Science Review*, 103, (2010), p. 55.

¹⁴⁶ Kroenig, 'Importing the bomb: sensitive nuclear assistance and proliferation', p. 40.

3.6 Iran Nuclear Enrichment Programs 1980-2015

The Iranian nuclear program has been hit by various cyber-attacks including the 2009 Stuxnet virus that hit computer programs associated with the nuclear program. This led to the decommissioning of over 800 centrifuges. However the Fordow Enrichment Center had an over 20% enriched uranium output. How did Iran get to this level and capacity? To answer this question one has to investigate the historical background of the Iranian program.

South Africa sold over 500 tons of uranium to Iran in the late 1970s. This is believed to be the major source of materials being used in the enrichments programs in Iran. The sources of uranium in Iran are limited and expensive to extract from start. In the early 1980s Iran purchased 450 tons of uranium from South Africa. Some 366 tons of this was subsequently converted to enriched uranium at Esfahan. This is the main, and practically the only, material being used in Iran's enrichment plants. This is due to the impurities in the resources which makes extraction and enrichment costly. The Isfahan Nuclear Technology Center is one of the main uranium conversion centers in Iran. However, the plant is under strict control of the IAEA. As of 2005 the IAEA made it public that over 600 tons of uranium had been produced indicating that Iran has the capacity and technical knowhow to convert resources into processed nuclear materials.

This development can be traced to high research efforts placed in the Iranian nuclear program. In 1967 a nuclear research center was setup called the Tehran Nuclear

¹⁴⁷David Albright, 'Did Stuxnet Take Out 1,000 Centrifuges at the Natanz Enrichment Plant?', *Institute for Science and International Security*, *56*, (2010), p. 14.

¹⁴⁸ Anton Khlopkov, Anna Lutkova, 'The Bushehr NPP: Why did it take so long?' *Centre for Energy & Security Studies*, 05, (2009), p. 12. (www.ceness-russia.org) retrieved 2016, 17 October.

Research Center. He center was established with technical support of the USA providing Iran with 5MW reactor and has since been operational. It is important to note that the IAEA has several monitoring agencies on the plant. In 1988 Argentina, nuclear specialists converted 90% of the raw materials at the plant into highly enriched uranium. In Argentina provided Iran with 120 kg of enriched uranium which is reasonably sufficient to last over 2 decades. By 2010 the 120 kg has been depleted reflecting a high enrichment level. Thus, evidence of international backing can be seen in the Iranian nuclear program. In late 2010 Russia aided Iran with more uranium for their reactor in exchange of 5% highly enriched uranium from the plant at Natanz. Iran refused this deal but revised the contract offering to supply Russia in small amounts over time and not in one shipment implying that Iran was now able to control the enriched materials for more time and do more with it.

Efforts to have a nuclear material deal with turkey and brazil failed in 2010 after Iran offered to ship 1500kg of enriched uranium to Brazil and Turkey in exchange of fuel technology and elements from the Russia, France, the USA and the IAEA making up the Vienna group. The Isfahan Nuclear Center has over 3 nuclear reactors used for research purposes supplied by China. The announcement in 2010 by Iran to have a new nuclear center at Shiraz capable of producing 20% enriched uranium led to international attention to be focused on the Iranian nuclear program. Iran went on to build a water reactor called the IR-40 at Arak and this reactor is identical to the ones used in Israel and Pakistan to produce plutonium needed in the manufacturing of nuclear weapons. The refusal by Iran to provide the IAEA with details of the IR-40

¹⁴⁹ George Perkovich, Mark Hibbs and James M. Acton, 'Parsing the Iran Deal,' *Dalton Carnegie Endowment for International Peace ISIS report*, (2015), p. 67. Retrieved 23 November 2016. ¹⁵⁰ George Perkovich, Mark Hibbs and James M. Acton, 'Parsing the Iran Deal,' p. 34.

design plans in 2006 led to speculation that the project was meant to be for nuclear weapons development. The UNSC made calls that Iran without delay should halt the construction of the plant. Iran declined the allegations noting that the plant was not meant for the production of plutonium and that its materials were not at weapons grade. In 2015 the UNSC went on to setup the Joint Comprehensive Plan of Action and China as a member has agreed to downgrade the Arak reactor. The JCPA consisted of China, France, Germany, the USA, Iran, Russia, the United Kingdom and the European Union (EU). Popularly known as the Iran deal, the framework was a tool that was meant to eliminate the potential militarization of the Iranian nuclear program and ensure that any development is solely for peaceful purposes.

3.7 Iran's Nuclear Program and Threats to Security

An important question that has been a critical security issue is whether the Iranian nuclear program poses a threat to regional and international security. The Western countries assumes a nuclear armed Iran will have serious repercussions for regional and international security especially for their allies. Iran signed the NPT in 1970 and singed several safeguard mechanisms that entitled the IAEA to inspect the nuclear programs in Iran. In 2002 several undeclared nuclear centers drew international attention and the IAEA made inspections revealing several inconsistencies to the protocols signed which led to the alarm that Iran had violated IAEA nuclear standards and its treaty obligations under the NPT. For over 2 decades Iran structurally hid some of its nuclear development programs regarded to have the capacity of developing nuclear weapons. Iran acknowledged to having undeclared nuclear sites but simply labeled the activities there as ordinary. In 2005 the IAEA

¹⁵¹ OECD NEA & IAEA, 'Uranium: Resources, Production and Demand' *IAEA website, Iran section.* (2006), p.26. Retrieved 9 October 2016.

asked Iran to suspend operations at these sites and to list them. The UNSC was called upon by the IAEA to put measures for compliance which resulted in the council calling Iran to suspend all activities without delaying including enrichment and processing plans. Iran refused to withdraw and continued with its operations. By 2007 the UNSC passes a unanimous decision adopting measures to impose sanctions on the Iran nuclear program. Iran continued to refuse the IAEA access to the experimental and research sites such as at Parchin. 152

Iran possessing nuclear weapons will appear as an aggressive foreign policy and will make regional and international foes uncomfortable resulting in more chances of confrontations. Iran is currently capable of hitting targets within the region, Europe and the USA troops stationed around the Middle East. In the event that the Iranian regime develops nuclear powered weapons the existing threat will rise significantly. Iran is regarded as of the major state sponsors of international terrorism through its economic system and also by offering technical support to militant movements like Hamas and Hezbollah based in Lebanon and Palestine. These groups have destroyed property worth millions in the region and killed many civilians. A nuclear armed Iran might distribute its nuclear weapons, nuclear know-how and technology to such extremist groups that are antagonistic to the west as well as regional powers such as Saudi Arabia and Israel. Is Thus Iran nuclear program might pose a perceived threat to regional and international security especially in the event that the other powers retaliate by acquiring a nuclear bomb in what can be seen as an effort to correct the balance of power. Iran could potentially share its nuclear

¹⁵² OECD NEA & IAEA, 'Uranium: Resources, Production and Demand' p. 40.

¹⁵³ William Potter, *The NPT and the Sources of Nuclear Restraint*, (Dallas; Daedalus Press, 2010), pp. 68–81.

OECD NEA & IAEA, 'Uranium: Resources, Production and Demand' p. 40.

technology and know-how with extremist groups hostile to the USA and the Western states such as Germany and France. Iran armed with nuclear weapons also poses a threat to USA and western allies in the region. The particular example is Israel since Iran's leadership has over the years threatened to wipe out Israel of the world map according to Ayatollah Ruhollah Khomeini. Moderate western and the USA allies such as UAE, Saudi Arabia and Bahrain are constantly watching what they perceive to be Iran's offensive regional policy and might feel threatened by a potentially

The Middle East is an important source of energy for the world as major source of oil. The Iran's perceived and offensive regional policy had driven its neighbors to

acquire and purchase arms in an attempt to balance power as they feel more insecure.

A possible conflict between regional powers will likely affect the production and

distribution of oil. This is greatly affects the region and the world's energy security.

Some experts like Sagan also fear that this might go on to spark a nuclear arms race

in the region that will only destabilize and already vital and volatile region as

claimed by the realist school of thought as there is no central power to safeguard the

security of other states. 156

nuclear-armed Iranian regime. 155

¹⁵⁵ Mitchel Reiss, *Bridled Ambition: Why Countries Constrain their Nuclear Capabilities*, (Washington, DC: Woodrow Wilson Centre Press, 1995), pp.24-34.

¹⁵⁶ Scott Sagan, Rethinking the causes of nuclear proliferation: three models in search of a bomb. In the South Asia,' (Stanford, CA: Stanford University Press, 1999), p. 36.

3.8 Adequacy of Security Theories under the Iran Nuclear Program

An investigation of the theories outlined above in relation to the forces behind Iran's nuclear program shows that there is no one answer to this question. To start with realism one can conclude that Iran's motivation is driven by human nature to defend her against perceived and potential threats. The international system has no overreaching authority to regulate the behavior of actors, therefore there should be a balance of power in the Middle East which can only be achieved by a strong Iran exercising her power over weaker regional powers by obtaining nuclear weapons. This might explain why Iran is pursuing nuclear program for military or civilian use because a nuclear capable state has leverage over regional and international politics. Hobbes disagrees sharply with the view that under such scenarios it is the strong that regulate the order of the international sphere.

Hobbes assumptions of the State of Nature, all men (states) are equal and thus relatively weaker states such as Iran, has also strength and capacity to kill the strongest such the USA and other Western countries, by secret machination as well as by confederacy with others like China and Russia that are facing the same threat zone. Iran being initially a relatively weak state compared to the USA would want to achieve parity through technical advancement especially in the field of nuclear development. This might explain why Iran might be interested in a nuclear weapons program for peaceful uses or otherwise. Iran might feel threatened by the hegemonic dominance of the USA in the region as well as the world. However, realism fails to explain the domestic aspect of Iran nuclear program and only focuses on the state as

¹⁵⁷ William Potter, *Forecasting Proliferation in the 21st Century: The Role of Theory*, (Palo Alto, California: Stanford University Press, 2010), p. 12.

the main actor in international relations. This brings one to the constructivism theory. Iran's military capacity of can be perceived as a menacing power or protecting capability by other states such as Israel. Does this then mean the Iran military structure is seeking a menacing status by pursing nuclear weapons? If the acquisition of nuclear weapons is solely for military prestige why is it then Iran's regime calls for civilian nuclear energy? This view seems to be half true while it can be argued that the military has an important need to be menacing, it is also untrue that one sector of the government determines the defense policy of a nation. This is because in modern Iran the parliament as well as the presidential office plays important roles in defense policy. 158

As opposed to neorealism that only basis its claims in the dominance of Iran's material power both economic and military, and neoliberal institutionalism that accepts a relatively narrow influence and role of non-material powers in international relations, constructivism gives top priority to the significance of a Iran's discursive power. Discursive power has been defined as the political perceptions or interpretations of Iran in international relations based on historical ideas, culture, ideologies and material power. Iran's discursive power is determined by ideas, culture, knowledge, ideology but also material power, both economic and political. In the same manner, the discursive power of Iran should be determined by ideas, culture as well as material power. What determines the nuclear policy of Iran is very much influenced by these notions. Iran's economic status backed by a sound oil

¹⁵⁸ Karhika Sasikumar and Christopher Way, *Testing theories of proliferation in South Asia*, (Stanford, California: Stanford University Press, 2009), pp. 67-78.

¹⁵⁹ Jim Walsh, 'Surprise Down Under: the secret history of Australia's nuclear ambitions'. *Non-proliferation Review School*, 03, (1997), pp.1–20.

¹⁶⁰ Scott Sagan, *The Causes of Nuclear Weapons Proliferation*. (Stanford University, Stanford, California, 2011), p. 47.

industry is very much capable of favoring nuclear programs. However how does culture contribute towards Iran's defense policy? This is a normative question that requires a new research on the role of culture in defense policy. A closer clue might be a culture of high national esteem and values is more defensive and protective than a culture with less regard to its values. Thus, this theory helps also to understand forces behind the Iran nuclear program.

Last but not least is the Copenhagen approach to understanding the forcing behind Iran nuclear program. As an alternative approach, Buzan discusses security offering three levels of analysis and five sections of security. He argued that security can be viewed on individual, state and international system level. Thus, to understand the driving forces behind the Iranian nuclear program one has to understand the threats at individual level which include human security the need to create employment through nuclear development and as well as providing prestige and glory to individuals as citizens of a nuclear armed state in Iran. State security is much liked to Iran's protection against invasion, internal and external attacks in the region. At the international level, Iran seeks to counter perceived hostile powers such as the USA and other western states like France and Germany. This is then balanced by offering five sections of security which are environment based, economic issues, and politics based issues, societal and lastly military issues. An investigation of all the sections shows that forces behind Iran nuclear program are of a combined economic, political, societal, environmental and military nature as they all influence on another. This theory offers one a detailed framework to discuss the major components behind Iran's nuclear program.

CHAPTER IV:

MAJOR FINDINGS: THEORETICAL PERSPECTIVES OF THE IRANIAN NUCLEAR PROGRAM

4.1 The Realism Perspective

Iran has caused serious debates among the UN as well as the UN Security Council (UNSC) as the state was suspected of developing nuclear capability from 2003. Iran also started developing ballistic missiles capable of carrying nuclear warheads. ¹⁶¹ It is clear the issue of nuclear proliferation is a major international security matter. This is despite any reason whatsoever justifying the research and development of such weapons. The process of nuclear weapons development for civilian or military purposes leads to many security concerns under the NPT as the major regulatory law of nuclear development and possession.

Iran's insecurity and fears cannot be accurately predicted but considering there is a threat from regional opponents such as Saudi Arabia and Israel chances are that their nuclear program is meant to increase the state's prestige and cover up insecurities regionally and international. It is also important to balance between need for nuclear development and insecurity. On this note it cannot be argued that the program is as a result of fear and insecurity as claimed by scholars associated with realism. The basic assumptions of Thucydides are similar to that of Hobbes however what is important is his argument that the strong must govern the weak to maintain order in the international system. This statement raises a question that: Is Iran trying to gain a nuclear advantage over its rivals so as to govern them or at least have a stronger voice in international decision making? To answer this question accurately it is

¹⁶¹ Paul Kent Alkon, *Winston Churchill's Imagination*, (London; Associated University Press, 2006), pp. 156–160.

important to understand Iran's foreign policy as well as regional balance of power. When this argument is applied to states it can be seen that there is a desire to acquire a defensive and hegemonic position by states in an attempt to seek a redress caused by the disparities in the international system.

The tenants posed in this works of Hobbes might explain why Iran is researching and developing a nuclear program and also recognise the differences in power capabilities of states in the region such a Saudi Arabia and Israel as well as the impact on foreign policy which can be both positive and negative. Therefore, Iran might be trying to secure power in the region and influence through various means including nuclear capabilities and development. Iran is therefore trying to obtain power through its nuclear program. The most outstanding weakness of these assumptions is that they are power oriented basing only on Iran's nuclear program as power based thus fail to identify other factors such as the power of democratic citizens in Iran to influence foreign policies, idealism and the rule of law instead of power. In this instance is the Iran nuclear program backed by citizen support? To answer this question, it is important to understand that Iran holds parliamentary as well as presidential elections to decide the nation's policy makers including nuclear program. Definitely the decision to pursue nuclear weapons might not be directly a citizen demand but the backing of the Iranian citizens might propel the regime in Iran to pursue nuclear capabilities. Thus, the elections held in Iran are a source of citizen support to the administration that whatever defence policy the government is working on, it has a mandate from the people to execute freely.

Theorists associated with realist assumption such Hobbes and Thucydides argued that human beings are by nature individualist and seek to maximize power at the expense of others. Therefore social structures in Iran are usually ineffective in taking out the human nature which according to Snyder represents a perpetual restless desire for power that could only end in death. In Iran, social or political setups by nature are always struggling for power this can be seen through various groups competing for control of parliamentary positions and even the presidential post in a bid to determine policy action. Ultimately this competition is even expressed more in the winning party's defence and foreign policy such as nuclear development. Iran's nuclear program might be explained as a struggle for power and dominance inherent in human nature. However, power can still be obtained without the need to possess it at the expense of other states.

Iran is also entitled under international law to defend itself against perceived enemies. Due to the lack of a central authority in the Middle East, officials and states in the region are in a state of nature, one which Hobbes describes as anarchical and lacking any central authority to regulate and govern individual actors. As a result, governments and states such as Iran and Israel tend to seek power and protection from such a lawless state of nature as the struggle for scarce resources becomes fierce by way of developing a nuclear program. However, argument seems to be less applicable in the Middle East as states are signatories of international law and members of organisations such as the Arab League that make binding rules on all members thereby removing lawlessness and anarchy. Thus, to state that Iran is

¹⁶² Sonali Singh, Christopher Way, 'The correlates of nuclear proliferation: a quantitative test,' *Journal of Conflict Resolution*, 48, (2004), p. 85.

¹⁶³ Karhika Sasikumar and Christopher Way, *Testing theories of proliferation in South Asia*, (Stanford, California: Stanford University Press, 2009), pp. 67-78.

pursuing a nuclear program because of a lack of central authority might not be accurate enough.

Politics is the utility of power in international relations. He argues that power is the control of man over man. ¹⁶⁴ As Iran possess territories, resources and influence in the end the more power and capability the more they can ultimately control the way of life and politics in the Middle East. Power in this regard is defined in terms of Iran's political and military strength. Therefore, in discussing this idea it can be argued that Iran's political leaders think and act in terms of power defined as political and national interest. Universal moral principles or in modern terms; international laws cannot be fully applied to the actions of Iran as they view morality as a threat to their national interests.

Countries in the global system are of similar fashion such as units of a state in a domestic structure and they have identical interests: Survival. In the Middle East, the setup of the global political system in particular the UN authority system that is controlled by five permanent members like the USA, Britain, Russia, China and France, is usually influenced by the notion that some countries such as Iran would rather survive and hence purse controversial political goals based on a long term view and they behave with the need to realize that goal by any means necessary including nuclear programs. The similarity in the behaviour of states such as Iran and North Korea that have nuclear program in contrast to international law over years can be argued to have been caused by the limitations on their behaviour imposed by the

¹⁶⁴ Hans Morgenthau and Kenneth Thompson, *Politics Among Nations*, (New York: McGraw-Hill,1985), p. 165.

¹⁶⁵ Kenneth Waltz, 'Realist Thought and Neorealist Theory', *International Affairs School*, (1990), pp. 39-48.

structures of the global system most the UN which has a power and authority imbalance. The UN and the Arab League systems are defined by the principles (economic or political) on which they are built, followed by the layout of its units in the form of member states, and lastly by the layout and distribution of political, military and economic capabilities (power) across units. International anarchy which Waltz defines as the absence of central governing authority stands as the outstanding principle of the UN international system as all members are regarded as equal in principle. The units of the international structure are the states like Iran. These states might seek to redress the imbalance of power in the region and in the world caused by structural nature of the international organisations for instance the UN and Arab League.

Since all Iran places survival on the core of its policies, it can be argued that anarchy is generated as the state regard the structure as a self-help system in which individual states have to take care of themselves. Ultimately the roles and influence of Iran are based on her capabilities as a unit or state. The strength of these assumptions is based on the utility of power, units and capabilities in relation to state behaviour. The role played by Iran is determined by the number of units or states influencing it both regionally and internationally. This influence might be regarded by Iran as threats from Israel and Saudi Arabia as opponents or opportunities from Syria and Lebanon as Iran's allies. It can also be argued that Iran possessing greater capabilities including nuclear programs tend to seek more power and the desire to influence more

¹⁶⁶ Hans Morgenthau, *Scientific Man Versus Power Politics*, (Chicago: University of Chicago Press, 1946), p. 34.

¹⁶⁷ Kenneth Waltz, 'Realist Thought and Neorealist Theory', *International Affairs School*, (1990), pp.39-48.

units in the international system in an attempt to survive or dominate.¹⁶⁸ Moral principles in international politics are not as important as survival as argued by Waltz which is a strong proposition.

4.2 The Constructivism Perspective

In constructivism anarchy and the unequal distribution of military capabilities do not determine Iran's identity and its relations with others. A strong military capacity of Iran can be perceived as a menacing power or protecting capability by other states in the region. Does this then mean the Iran military structure is seeking a menacing status by pursing nuclear weapons? If the acquisition of nuclear weapons by Iran is solely for military prestige why is it then Iran's regime calls for civilian nuclear energy? This view seems to be half true while it can be argued that the military has an important need to be menacing, it is also untrue that one sector of the Iranian government determines the defense policy of the nation. This is because in modern Iran the parliament as well as the presidential office plays an important role in defense policy of Iran.

For instance, the Iranian nuclear weapons capability is perceived differently by Syria as compared to a nuclear weapons program in the hands of Israel as these states are both an ally and a foe of Iran. Although Iran's military power and its distribution always become influencing factors in international relations, the two cannot exhaustively interpret relations among states in the Middle East. The relationship

¹⁶⁸ Benjamin Simmons, 'Compliance with international agreements,' *Political Science Review*, 94, (2000), p. 22.

¹⁶⁹ Chaim Braun, Christopher Chyba, 'Proliferation rings: new challenges to the nuclear non-proliferation regime,' *International Security Review*, 29, (2004), p. 49.

¹⁷⁰ Bleek Potter, Why do states proliferate? Quantitative analysis of the exploration, pursuit, and acquisition of nuclear weapons, (Chicago; Chicago Press, 2010), pp. 70–72.

between Iran and Saudi Arabia as regional opponents in terms of the potential to be become allies for cooperation or enemies in conflict can be forecasted by only understanding the military structures of the concerned states. Thus, by investigating the military structures, goals and nuclear capabilities of Iran and Saudi Arabia one can conclude that, Iran seeks to maximize power in relation to the regional and international military status of her regional competitors. Iran's political identities in terms of governance and its social structures are also important factors that determine the type and quality of relations with other states. Iran's social structure is one characterized by an overwhelming Islamic populace that is very supportive of the government's policies. This is even more when religion acts as social glue led by Ali Khamenei the Supreme Leader of Iran. ¹⁷¹

Similar political identities such as the governance structures and long-history of cooperation between Iran and Russia for instance, can be a basis upon which cooperative security system are established; but distinct political identities and long-history of tension between Israel and Iran can result in the construction of a competitive regional security system leading to Iran pursuing a stronger military status. Countries cooperate in nuclear programs based on their governance structures, goals and history. It might be argued that Iran's nuclear cooperation with Russia and North Korea in terms of expertise, machinery and equipment is a direct result of similar constructive structures according to Aljazeera news source. 172

¹⁷¹ Morgen Montgomery and Scott Sagan, *The perils of predicting proliferation. In Causes and Consequences of Nuclear*, (Washington; Washington Inc, 2011), p. 32.

¹⁷²Aljazeera News, 'North Korea nuclear test: World leaders react,' (2016), p 2. http://www.aljazeera.com/news/2016/09/north-korea-nuclear-test-world-leaders-react-160909055255360.html obtained 23 August 2016.

In addition, as opposed to neorealism that only basis its claims in the dominance of Iran's material power both economic and military, and neoliberal institutionalism that accepts a relatively narrow influence and role of non-material powers in international relations, constructivism gives top priority to the significance of a Iran's discursive power. Discursive power has been defined as in the case study the political perceptions or interpretations of Iran in international relations based on historical ideas, culture, ideologies and material power. ¹⁷³ Iran's discursive power is determined by ideas, culture, knowledge, ideology but also material power, both economic and political. What determines the nuclear policy of Iran is very much influenced by these notions. Iran's economic status backed by a sound oil industry is very much capable of favoring nuclear programs. However how does Iran's culture contribute towards the defense policy? This is a normative question that requires a new research on the role of culture in defense policy. A closer clue might be a culture of high national esteem and values is more defensive and protective than a culture with less regard to its values.

These factors and influences through state actors interact to construct the international system. Discursive power operates by creating and producing Iran's subjective perceptions. It aids in explaining how the material structure, international events, Iran's political identity, relations between or among the Middle East states, and any other social relations should be described and understood. With discursive power, the same material expression can be manipulated to produce certain interpretation and weaken alternative meanings. A typical example is that Iran due to its discursive power is able to present unique interpretations for North Korea or the

¹⁷³ Scott Sagan, *The Causes of Nuclear Weapons Proliferation*. (Stanford University, Stanford, California, 2011), p. 60.

USA's security positions either as threats or opportunities for cooperation. ¹⁷⁴ The former seems not to be a real threat and the latter is an actual threat but both are nuclear weapons states; North Korea is not perceived as an enemy but the USA is an outright aggressor and enemy according to Iran. These political and security identifications are not induced as a result of material power alone or its distribution but they are a result of a construction through the Iran's discursive power. Therefore, Iran through its discursive power might perceive the acquisition of nuclear weapons as beneficial, moral and necessary to its national survival. At the local level of constructivism and Iran's nuclear program has been, to a significant extent, influenced by forces of national pride and identity. 175 However, the emphasis of domestic constructivist assumptions emphasizing nationalism finds its way up to the international level: Iran's bitterness and victimization in foreign policy can be argued to be a result of long ill-treatment by other powers in the region such as Iraq which used chemical weapons against Iran in the early 1990s. There is a legitimate frustration with what Iran perceives as security double standards in the nuclear policy that would maintain their enemies' strategic dominance and supremacy but deny nuclear capability and facilities to other states in the Middle East.

From this discussion, Iran's ideological reasons far outweigh strategic goals in motivating the state in pursuing a nuclear program, and propaganda policies.¹⁷⁶ Realist models that place a premium on external forces alone and strategic regional insecurity of Iran do not stand up to the ability to fully explain the state's nuclear

¹⁷⁴ Michael Tomz, 'Domestic audience costs in international relations: an experimental approach' *International Organisations Review*, 61, (2007), p. 40.

¹⁷⁵ David Albright, *Peddling Peril: How the Secret Nuclear Trade Arms America's Enemies*, (New York: Free Press, 2010), p. 23.

¹⁷⁶ Gerald Brown, Mathew Carlyle, 'Anatomy of a project to produce a first nuclear weapon,' *Global Security Journal*, 14, (2006), p. 82.

ambitions. Fears of superpower biasness have been increased by the culture of weak state victimization, and the aggressive sense of superpower nuclear policies that has dominated the nuclear relations of states. This results in Iran seeking deterrence or defensive capabilities. Iran's military nuclear program usually perceived as a symbol of national pride, the nuclear program of the state draws popular support in constructivist theories, rather than regional strategic explanations.

Iran's nuclear decision-making capacities might be concentrated in the hand of hard-liners and clerical elites, thus the nuclear program enables the government to increase its self-identity as an anti-western and regional Islamic power.¹⁷⁷ Though Iran's strategic interests may have initially propelled the nuclear programs as they offer foreign policy justifications vis-à-vis deterrence of the USA, powerful constructivist motivations, taken advantage of by Iran might be the central reasons behind the Iranian nuclear policy. The regime is perceived to be radical by Western states since many violations of the Nuclear Proliferation Treaty by Iran has happened.¹⁷⁸ However it is still not enough to base assumptions on these factors in the domestic space of Iran. A more detailed debate will have to be executed in line with other relevant theories.

¹⁷⁷ Jo DJ, Etel Gartzke, 'Data notes for determinants of nuclear weapons proliferation." *Sagepub Journal*, (2007), p. 34.

http://jcr.sagepub.com/content/vol51/issue1/images/data/167/DC1/Jo&Gartzke_(Feb_07).zip obtained 24 May 2016.

¹⁷⁸ Mathiaus Kuntzel, *Bonn and the Bomb: German Politics and the Nuclear Option*, (London: Pluto Press, 1995). p. 45.

4.3 The Copenhagen Perspective

Barry Buzan articulated the concept of security as a limited field and one that had to be broadening beyond the scope of just military centered. 179 He therefore went further to elaborate the concept offering a more comprehensive view on Iran. This new approach incorporated perceptions that were not subsequently regarded to be part of the security nexus for instance notions of Iran's regional security, sociological and environmental subdivisions of security.

The realist definition of Iran's security as being a wholesome contest for power is outmoded, resulting in a myopic world view, and this only hinders the strategy makers or international relations academics in coming to an inclusive understanding of the Iran nuclear program. 180 As an alternative approach Iran's security can be viewed on individual, state and international system levels. This is then balanced by offering five sections of Iran's security which are environment based, economic issues, and politics based issues, societal and lastly military issues. The perceptions offered on Iran might not be exhaustive in isolation with regards to the question of securitization, they are related creating a network and sequence that political experts should untangle to comprehend all the concepts so as to grasp how the notions influence each other in total. In the first level of analysis focusing on the individual, in order to fulfill this intricate study of security in which Iran is assumed as the core referent, a question has to be asked with regards to this case what is the nature of Iran as a state actor? When explaining Iran's security in terms of individuals, it can be understanding that security can be measured as an aspect of life and its relative facets

¹⁷⁹ Barry Buzan, "New Patterns of Global Security in the Twenty-First Century." *International Affairs*, 12, (1991), p. 51.

¹⁸⁰ Buzan, "New Patterns of Global Security in the Twenty-First Century", p. 23.

of freedom, status, wealth and health. 181

Threats to Iran as a concept can be understood on an individual level. As stated, the concept of security is not a narrow model, because individual security and national security are two different but related notions. One can therefore reflect on the character of Iran in attempting to realize the security of larger and vaguer units which are nebulous in nature. A closer look at the nature of these elements in Iran one can tell that they can be turned into security related inquiries. By therefore studying them the broader picture of Iran's national security can be revealed in a more elaborative manner. The establishment of the interrelated network will help in coming up with answers to Iran's national defense policies.

The military, political, economic, environmental and societal sectors of Iran affect the individual citizens due to the changes at the government level. What is of paramount importance is to realize that Iran's five security sections should not be investigated in a separated manner and they do not work in sole. Each sector describes a central point and helps to order security issues. A more interesting argument is the link between the sectors and the concept of threats. Threats to the environment and social aspects of Iran might be driving force in crafting Iran's defense policy. These threats might be in the form of global warming and climate change or even the human security such as provision of jobs by creating new industries including nuclear related jobs.

¹⁸¹ Bleek Potter, Why do states proliferate? Quantitative analysis of the exploration, pursuit, and acquisition of nuclear weapons, (Chicago; Mukhatzhanova press, 2010), p. 76.

¹⁸² Buzan, "New Patterns of Global Security in the Twenty-First Century" p. 45.

¹⁸³ Abraham Itty, *The ambivalence of nuclear histories*, (London; Osiris Inc. 2006), p. 46.

The ecological, economic and societal sectors in Iran accompany the political and military securities and are more difficult to define. Threats of an economic nature are more challenging to study because of the complicated aspects of Iranian economics. As stated the normal conditions portrayed by Iran in a market based economy is one of danger, aggressive competition as well as vagueness, this apprehensive environment makes economic security tough to straighten out and how this ultimately affects the international relations of Iran. ¹⁸⁴ The economic sector is also a clear illustration of how the dissimilar sectors work together with one another. It is straightforward to see that Iran's military sector is reliant on the economic sector due do budget limitations. In addition, economic security can be deemed to be a key pointer as to the universal security of the state.

Iran hence can be motivated to purse nuclear weapons due to its sound economy. However, this has limitations as some states like North Korea and Pakistan with relatively weaker economies still pursue nuclear programs. A comparison of the USA and Iran shows that where there is economic security in terms of a stronger GDP, other sectors of security are relatively easier to develop. Hence Iran's economic security may determine its political and military policies in international relations such as nuclear research and development. Social securities in Iran are one of the most valued of all the other five segments of security. Disconnecting Iran's social security from political security is less academic since threats of a social nature are mostly linked to issues of national identity in any given nation. South Sudan is less prepared to deal with differences in national identities and customs as opposed to

¹⁸⁴ Buzan, "New Patterns of Global Security in the Twenty-First Century" p. 16.

¹⁸⁵ Cecilia Albin, *Justice and Fairness in International Negotiation*. 2006. (Cambridge, UK: Cambridge University Press, 2006), p. 45.

Iran that has a strong identity and culture. Iran's societal perceptions including religious beliefs and nationalism therefore impact on type of government, policies and ultimately influencing the nation's foreign policy. It is evident that social related security matters are highly related to the politics as well as the military segments of security in Iran. The majority of international conflicts including the controversial Iran nuclear program are mostly the ones with a societal category. Conflict between Iran and other regional or international actors were bound to happen due to differences in culture and civilizations which in turn determine threats, vulnerabilities and foes and allies. 186

It is consequently important to have more attention on this area and put them into the study of security especially on global level. Nevertheless, due to differences on civilizations between Iran and western states the concept of social security might not be simple to put into investigation without running the risk of being critically one-sided and contextual creations. This can simply guide researchers and policy makers into political prejudgment and exclusion. Iran's environment based security aspects are complicated to define and might be regarded as very elusive when compared to the other five segments. The threats facing Iranians today as a result of changes in the environment pose a real danger to the lives of the society. These threats range from global warming to the ruin of the ozone layer have led to alternative solutions such as nuclear energy that might be perceived as threats by other actors in the international system. All sections must be taken into account when examining Iran's security, both in isolation and collectively. One can argue that there is friendship and hostility among states, thus relationships between states are determined by alliances

¹⁸⁶ Samuel Huntington, *The Clash of Civilizations and the Remaking of World Order*', 1996. (New York, Simon & Schuster Inc, 1996), p. 34.

or simply by anxiety. The subjects that can disturb Iran's regional position in terms of policy range from issues such as national ideology, territorial identity, ethnicity, and historical pattern.

This is important to understand as it leads to the concept of hostility and determine the security situation or complex of Iran and its relative policies. ¹⁸⁷ Security complexes of Iran can be helpful in policy analysis and they also present an ideal framework to confer issues that are prevalent to a specific area. Possibly the most tremendous can be that of Israel and Iran. This security complex shows Israel's safety is connected to its regional position that is the Middle East and the opposite is also true of Iran, and in the end both sides take this complex into consideration when determining their national security policies. Threats and opportunities facing Iran in the regions can actor as positive and negative forces to develop nuclear weapons. These threats range from the USA military presence in the Gulf of Persia and Israel's hostility towards Iran. On the other side opportunities, can be in the form of regional power vacuums such as civil wars in Iraq, Syria and Yemen leading to Iran occupying an influential position in the region by developing a nuclear program.

4.4 The Supply-Side Perspective

To assess if a state is capable of developing a nuclear weapons program, researchers can use guidelines to determine a state's nuclear ambitions. Nuclear proliferation experts utilize Meyer's ground-breaking work *The Dynamics of Nuclear Proliferation* came up with a set of ten mechanical based and financial orientated

¹⁸⁷ Susan Hecker, *Lessons learned from the North Korean nuclear crisis*. (Chicago; Daedalus Press, 2010), p. 56.

indicators.¹⁸⁸ These can be summarized as in the case study Iran's domestic mining conditions, presence of locally sourced uranium deposits, and availability of metallurgy experts, steel manufacturing industry, construction teams, biochemical experts and skilled physicists-to determine whether Iran has latent capacity to produce nuclear weapons. This work might explain why states such as Iran pursue nuclear weapons.

It is challenging to assess the whether the availability of nuclear engineers in Iran as well as nuclear related materials could determine if the state was capable of forming a nuclear weapon. Meyer introduced two more standards to deal with this gap: First by checking if the Iranian government was working on a nuclear research program for periods up to three years and this would be a substitute for the atomic expert skills. Secondly if Iran had mass production of vehicles and factory manufactured radios or televisions; this substituted the skills needed for explosive making and electrical engineering as such a country had a capacity to deliver that already. Iran has thus provider is manufacturing ability so far in various industries including space exploration. Stoll introduced a new element in the standard of analysis while Meyer had focused on locally sourced uranium bases in Iran. Iran had access to nuclear resources stating that all states had access to nuclear materials in an international marketplace and those could be obtained fairly easily. Based on such notions Stoll noted that Iran has a dormant nuclear capacity. Iran might not produce a nuclear weapon unless is has highly enriched uranium obtained from its own local

¹⁸⁸ Mathew Meyer, *The Dynamics of Nuclear Proliferation*, (Chicago: University of Chicago Press, 1984), p. 13.

¹⁸⁹ Richard Stoll, World production of latent nuclear capacity. (Chicago; Fordham Press, 1996), p. 12.

reactors.¹⁹⁰ Thus even if Iran might have obtained nuclear materials, very few states can actually enrich the uranium into weapons grade materials. Therefore, Stoll's conclusions are fundamentally inconsistent with this mechanical restriction. However, the inspections made by the International Atomic Energy Agency found Iran with highly enriched uranium.

In short by focusing on Iran's supply side one can tell that the state's desire to have a nuclear bomb is related to the supply of nuclear materials and technical expertise needed to manufacture the bomb. This determines if Iran has a mechanical capacity to develop a bomb. The broader question is not about why so many nuclear capable states did not produce weapons but rather why Iran has developed or showed an interest in setting up nuclear facilities and machinery required to enrich uranium and the recycling of plutonium. It is worthwhile to note that the Iranian nuclear proliferation is associated with availability of capital and avenues of trade allowed under international commerce. The spread of nuclear facilities in Iran is strongly tied with the supply of technology and materials. Nuclear trade with Russia and North Korea offers material technology. The international nuclear backing of Iran by Russia is therefore associated with the produce of nuclear products. ¹⁹² This is further supported by the Iran's GDP, industrial base and the type of regime in Iran which is rather independent in undertaking the nuclear program. This leads to an interesting assumption that Iran because of international nuclear assistance from Russia or local

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¹⁹⁰ Jeck Hymans, *The Psychology of Nuclear Proliferation: Identity, Emotions and Foreign Policy*, (Cambridge, UK: Cambridge University Press, 2006), pp. 67-70.

¹⁹¹ Peter Lavoy, 'Nuclear myths and the causes of nuclear proliferation,' *Security Studies Institute*, 23, (1993), p. 212.

¹⁹² Mathew Kroenig, *Exporting the Bomb: Technology Transfer and the Spread of Nuclear Weapons*. (Ithaca, New York: Cornell University Press, 2010), p. 25.

capacity in terms of resources and skills was more likely to develop a nuclear weapons program.

A new question emerges as to why would Iran and Russia trade or offer sensitive nuclear assistance to each other given the fact that this would without doubt allow for the spread of nuclear weapons in the region. 193 Most experts tend to conclude that national interest fosters unity amongst allies and most regimes do this for the monetary benefits as a trading strategy. One may argue that Russia offering nuclear support to Iran might be interested in tilting the balance of power in an area of the interest. This is usually the case notwithstanding, the expected proliferation costs. Governments such as Russia and Iran which are allies are also more likely to offer complex nuclear technology or support to other regimes where the perceived opponents of the assisted regime are also regarded as foes of the supporting regime. The conclusion by Russia might be that Iran as the perceived foe of the USA and Israel might be a good customer.

4.5 The Demand-Side Perspective

Diverse political actors in Iran are investigated in their role as having contributions in the demanding of a nuclear program. These policy makers determine the national defense policy even so the nuclear policy in Iran. Sagan's work outlined Iran's security pressure, domestic political will and international laws on the spread of nuclear weapons as having a determinative effect on nuclear proliferation. 194 Security pressure in Iran emanated from the military inspirations. Secondly domestic political

¹⁹³ Michael Annunziata. 'Radioactivity: Introduction and History'. Elsevier Peace Journal, 13, (2007),

p. 24.

194 Scott Sagan, Why do states build nuclear weapons? Three models in search of a bomb, (Chicago; International Security Chicago Press, 1997), pp. 50–55.

will include political class in Iran both the elected and administrative class who act to back or disregard calls for nuclear weapons using legislation. Lastly international law focused on customs and statutes that can promote or discourage the attainment of nuclear weapons by states. Sagan developed a strong support on the Iranian security model that the military sector promoting or pushing for nuclear weapons would result in Iran initiating a nuclear program. On the other hand, Iran's domestic administrative support and moral society backing were sufficient though not mandatory conditions for establishing nuclear weapons. 195

The case of Iran has a focus on the intentions and tactical inclinations of both the administrative and political leaders. It will be particularly respected, consequently, for forthcoming investigators to examine these models more extensively. The secrecy of the Iran nuclear programs has led researchers (such U.S. intelligence experts) to investigate whether nuclear installations and equipment are for peaceful use or military basis. Nuclear ambiguity of Iran questions whether the administration is seeking nuclear weapons or it is not. ¹⁹⁶ On the other hand, nuclear opacity is when Iran uses civilian nuclear programs to hide its real purpose? Abraham is of the notion that political leaders in Iran may not have an intention or well-planned nuclear policy. The political leadership may act under calls from other groups driving for either nuclear arms or for nonviolent civilian energy. This is determined by a wide variety of political and community conditions that appear usually after the leadership has opened up dialog on nuclear programs.

¹⁹⁵ Scott Sagan, Rethinking the causes of nuclear proliferation: three models in search of a bomb. In the South Asia,' (Stanford, CA: Stanford University Press, 1999), p. 40.

¹⁹⁶ Abraham Itty, *The ambivalence of nuclear histories*, (London; Osiris Inc. 2006), p. 51.

Realism claims that most political leader in Iran require a bomb mostly for security reasons but in actual fact few leaders in the country some even wanted to cancel the program during the Cold War.¹⁹⁷ Iran with a stronger GDP and sound trade percentages is more capable of exploring, initiating and developing nuclear weapons. This is important because of the cost involved in nuclear development. Such an economic incentive might act as an enabling factor. Commercial development in Iran is of paramount importance however this statement was still unclear since there are countries with strong GDP and trade balances like Australia and Canada but have no nuclear weapons.¹⁹⁸ Thus economic development is not completely a cause factor in nuclear propagation.

¹⁹⁷ Jeck Hymans, *The Psychology of Nuclear Proliferation: Identity, Emotions and Foreign Policy*, (Cambridge, UK: Cambridge University Press, 2006), pp. 56-60.

¹⁹⁸ Bleek Potter, Why do states proliferate? Quantitative analysis of the exploration, pursuit, and acquisition of nuclear weapons, (Chicago; Mukhatzhanova press, 2010), p. 80.

CONCLUSION

In the final analysis, the Iran's nuclear program might have threat implications to regional security both real and perceived. The driving forces behind Iran nuclear program are economic, political, social, environmental and military based. Thus, there is no one factor behind this nuclear program. The supply-side and demand-side shows that Iran's nuclear program is very complex and sensitive as it has many factors aiding and backing the program such as Chinese and Russian assistance as well as locally supplied resources and skills. The security theories offered above cannot in this case answer the questions under investigation in isolation. Due to the complex nature of the Iranian nuclear program it is important to use all three theories to understand the driving forces as none can fully explain the nuclear policy Iran is embarking on. Thus, a reawakening in nuclear propagation research is under way. 199

Realism clearly explains that Iran's state egoism and struggle among international actors like the USA and Saudi Arabia is due to the naturally selfish nature of the concerned states. Thus, Iran might pursue a nuclear program to address this inherent nature in international politics. However classical realism implies that Iran is by nature offensive and it alleges that the nuclear program is for military purposes though not enough evidence has been gathered. On the other realism alleges Iran nuclear program is defensive against regional and international threats such as those from Israel and Saudi Arabia thus Iran might be balancing power by having a nuclear program with a military status which has led other theorists to modify the theory into defensive and offensive realism. Defensive realism is a modification of classical

¹⁹⁹ Peter Toft, "John J. Mearsheimer: an offensive realist between geopolitics and power", *Journal of International Relations and Development*, 8, (2005), p. 23.

realism which when applied to the case of Iran it can be argued that the state pursues and maintains defensive and reserved policies in an attempt to attain security due to the anarchical structure of the UN international system. This is in contrast to offensive realism which argues that Iran might be seeking to maximize her influence and power economically, militarily and socially in order to maintain hegemony, security and domination as there is no central authority to guarantee the survival of actors in the system. Both dimensions might be sound but not clearly verified.²⁰⁰

These assumptions therefore reveal that the lack of a central authority combined with an egocentric human nature in the international system breeds conflict and struggle amongst nations which might explain why Israel is one of the major states in the region that regards Iran nuclear program as a threat and alleges that it is meant for military reasons. The strength of this argument is based on the evidence of struggle, conflict and power maximization socially, economically and politically between Israel and Iran in the international system due to a lack of central authority which might be said to have been a natural instinct in mankind. It can also be argued that the pursuit of nuclear weapons and programs by the Soviet Union and Iran during the Cold War era was either defensive or offensive realism or simply a combination of both. Therefore, while realism answers a minority of questions in international relations, it still leaves the majority questions unanswered such as the role of domestic politics in nuclear proliferation.

²⁰⁰ Beth Simmons, 'Compliance with international agreements", *Political Science Review*, 94, (2000), p. 35.

Realism concludes that morality or ethics have no place in the Iranian foreign policy. These assumptions are applied to both domestic and international politics of Iran. Thus, nuclear decision making in Iran might be free from moral international law obligations and hence the launch of controversial nuclear weapons. Immoral international policies such as the Iranian nuclear program are justified to achieve any political ends as eluded by realism. Therefore, whatever is good for the Iran might be justified and executed despite its breach of any international law or moral standard, civilisation or ethics. This assertion is based on the premise that Iran can adopt controversial policies in the international system even if such actions are 'evil' rather for realism, evil is good. These assumptions entail that the highest moral value of Iran in having a nuclear program is that of survival in terms of both military and economic energy produced through nuclear fuel and the protection of the Iran by any means necessary or unnecessary and that securing, maintaining and promoting national power is a duty and right of Iran.

It might be argued that international agreements are binding only when they are beneficial to Iran but in essence they could be easily broken once they threaten the survival of the state. From this basis, it can be argued that Machiavelli's realism was pragmatic in explaining the events leading to the development of nuclear program in Iran between 1945 and 2015. This period can be said to be a combination of power and influence in policies of war and economics for power maximisation in the region.

²⁰¹ Samuel Barkin. *Realist constructivism*, (Chicago. International Institute Press Inc, 2003), p. 325–42.

Realism is of the view that politics in Iran, similarly to society, is administered through objective laws which are influenced by human nature. A nature which is eternal: Hence it is plausible to develop a theory that reflects the presence of such objective laws as nuclear policies and programs. The main feature of political realism in the case of Iran is the function of interest explained in terms of power. Political realism argues in favour of the rationality, objectivity and unemotional political and social behaviours expressed by domestic actors in Iran. Iran's interest in terms of power is an objective categorization which is generally valid but not with a one size fit all meaning. Power should be seen therefore as the control and dominance of man over man including the development of nuclear programs by Iran as a way to dominate regional politics and have a say in global affairs.

Political realism recognizes the moral importance of any of political behaviour in Iran. It is not blind to moralist as such but realism strikes a balance between moral demands and prudent political behaviour of actors in Iran. Thus having a nuclear program might not be an 'immoral' issue or a threat but the uses of the program might be of concern such as to destroy or to build weapons of mass destruction. The political realists maintain the independence of Iran political sphere. By the mere fact of being an independent and sovereign state, Iran has a right to develop peaceful nuclear programs.

It can also be concluded that politics in Iran, just as in any has society, is governed by laws which are objectively rooted in human nature such as the need to maximise security and have influence over other actors. In this regard, Iran's foreign and domestic policies are formulated based on human nature which is egoistic and power centric. While there is a challenge on the effects of morality on political actions, under realism the political interest of Iran is far more significant than universal morality of any given community in international relations. Iran therefore seek to purse a foreign and nuclear policy agenda that is both state centric, maximising benefits and minimising risks.

Iranian politics is the utility of power in international relations. Thus, one can argue that power is the control of man over man. As Iran possesses territories, resources and influence ultimately, they will control the way of life in the polity and in the region. Power in this regard is defined in terms of Iran's political and military strength. Therefore, in discussing these ideas it can be argued that political leaders in Iran think and act in terms of power defined as political interest. Universal moral principles or in modern terms; international laws such as the regulatory NPT cannot be fully applied to the actions of Iran as they view morality as a threat to national interest. This conclusion is based on the premise that Morgenthau calls for a balance in policy between the influences of morality and power as more prudent than any extreme end of the two. This is because countries like Iran in the global system are of a similar fashion such as units of a state in a domestic structure and they have identical interests: Survival. In international politics, the setup of the global political system is usually influenced by the notion that Iran would rather survive economically and militarily by pursuing controversial political goals based on a longterm view and they behave with the need to realize that goal by any means necessary. The similarity in the behaviour Iran and North Korea nuclear programs over years can be argued to have been caused by the limitations on their behaviour imposed by the structures of the global system which has an imbalance of power distribution.

Constructivism argues for a more internal analysis of political systems within the state. Instead of focusing on power capabilities and anarchy, constructivism focuses on Iran's internal structures such as history, culture, religion and identity to determine how Iran is likely to act in the international system. Political and military structures determine a state's international outlook.²⁰² The relationship between Israel and Iran in terms of the potential to be become allies can be forecasted by only understanding the military structures of the concerned states. The military administration in Iran is more focused towards power maximisation and security as seen by their continued push to argue that regional foes are a threat to national security hence Iran should balance against any attempts to hegemony by competitors.

Political identifies shapes how foreign policies are crafted. Regime types, systems of governance and distribution of power in a state as a system determines the postures a state takes in the international stage. This overall determines the types and quality of relations a state will have with other actors. Iran's Islamic regime might be oriented towards developmental projects and self-determination policies as derived from its religious values. Nuclear programs thus might be a result of such social identities. Iran's social structure is one characterised by an overwhelming Islamic populace that is very supportive of the government's policies. Religion acts as social glue to drive the nation towards developmental projects in this case the population will act as moral backing to its government. The Supreme Leader of Iran Ali Khamenei has for decades rallied the Iranians towards nuclear development policies as means to achieve energy and political independence. Therefore, nuclear development in Iran has a stronger domestic backing to begin with.

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²⁰² Beth Simmons and Daniel Hopkins, 'The constraining power of international treaties: theory and methods'. *Political Science Review*, 99, (2005), pp. 623–631.

Political identities can also include governance structures and political history. These two-constructivist variables determine types of international cooperation a state might have with other states. For instance, the Russian system of governance and political history has various similarities with that of Iran. Russia believes is self-assertion and political independence this can be shown in the form of a strong military posture. The case also applies with Iran with strong desire for self-assertion regionally and internationally. Historical ties between Iran and Russia date back to centuries ago as well as during the Cold War the two states enjoyed a relatively warm cooperation on various issues such as security and developmental projects. The post-Cold War era is marked by increased cooperation between the two countries. This might explain from a constructivist perceptive that Iran's nuclear program exists because of nuclear support from Russia due to the similarities in social and political identities. It might be argued that Iran's nuclear cooperation with Russia and North Korea in terms of expertise, machinery and equipment might be a direct result of similar constructive structures.

However, it is important to note that states can still cooperate despite similarities in political history or governance structures as claimed by the constructivist theory. In the 1970s France, the USA and Britain contributed to the nuclear development of Iran despite having vast differences in types of political identities. This level of cooperation implies that there are other factors that drive state action as thus the realist assumptions must be taken into account that state cooperate on the basis of power maximisation rather than pursing isolationist policies.

Constructivism investigates a state's discursive power and how this might shape international relations. The political social and economic perceptions of a state and ultimately the nuclear and foreign policies are a result of ideologies and culture. The economic status of Iran backed by a sound oil and scientific research industry favours the development of nuclear programs both from an economic stand point as well as a scientific view. However how does social culture contribute towards Iran's defence policy? This is a normative question that requires a new research on the role of culture in nuclear and defence policy.

These domestic structures play a significant role state by state in shaping the behaviour of states in the international system. Opposing social identities are more likely to clash than similar identifies. Iran's discursive power is more likely to produce an antagonistic view of Israel's regional policies and the opposite is true since these two states have opposing religion and values as well as opposing political histories marked with less cooperation and more conflicts. However, Iran is likely to cooperate with Turkey over wide range of issues than it does with Britain. However, this does not mean that there are no opportunities between the antagonistic states. Similarly states with identical domestic identities might still have different national interest goal and they might not even cooperate. Therefore, Iran through its discursive power might perceive the acquisition of nuclear weapons as beneficial, moral and necessary to its national survival and political influence in the region.

The balance of power is also affected by political and social identities under constructivism. Global system can be cooperative or hegemonic depending on the dominant political and social identities of states. Constructive substitutes the balance

of power with the balance of threats noting that a state might perceive other state's actions as either a threat of an opportunity hence the concerned state will the craft policies to promote the opportunity presented or fend off the potential threats. The USA nuclear support to Iran during the Cold War was regarded as an opportunity by Iran. Using her discursive power, Iran went on to seize the opportunities presented to her by the USA in the form of technical and financial support. However, from the early 2000s both the USA and Iran discursive interpretations changed towards each other. The USA began to regard Iran as a regional threat to its interest and well as to its allies such as Israel. Iran conversely altered and began to view the USA's policy towards Iran as hostile and manipulative. This shaped the next one and half decade of the USA-Iran nuclear relations from 2000 to 2016 which was marked with punitive sanctions and counter balances by each side.

Thus, Iran's international behaviour and nuclear polices was shaped by its discursive power and not just the egocentric desire and anarchy of the international system as claimed by the realist school of thought. Constructivism thus offers an alternative framework from which international relations can be understood. This framework claims that international politics is also a byproduct of social construction and that politics originate from the continuous processes of social interaction. There are two basic features of constructivism in Iran, first that the systems of human association depend largely on shared ideas and culture rather than material external forces alone, and that the positions and goals of different actors in the Islamic Republic are a product of these established ideas and not by their given nature.

A remarkable number of Iranian citizens claim to have a non-negotiable legitimate and national right to nuclear technology. Iran has managed to harness these nationalist sentiments through social and political tools such as propaganda and religion. Therefore, the acquisition of nuclear technology provides Iran with a strategic advantage where the nuclear program will be a source of national pride and identity thus the Islamic regime would gain more domestic approval. Internationally Iran would have more power, influence and control. Forces of nationalism are easily generated by the perceptions of Iranian citizens who regard western policies such as the USA economic sanctions and regional interventions by the EU in Syria and Iraq as hostile and ill-treatment. Thus, there is a legitimate frustration with what Iran perceives as security double standard in the nuclear policy that would maintain Israel's strategic dominance and supremacy but deny nuclear capability and facilities to other Iran as an equal and sovereign regional power. Nuclear programs usually perceived as a symbol of national pride draws popular support in constructivist theories, rather than realist based regional strategic explanations alone. In this case, power-centric theories have a limited meaning to Iranian citizens than ideological and nationalist sentiments.

They would rather have a counter nuclear policy program even at the expense of regional and international balance of power. Thus, to argue only on the basis of external forces as a cause of Iran's nuclear program is rather shallow and fails to capture the whole picture of the forces at play in Iran. States like Iran seek defensive or deterrent capabilities due to fear of victimization and the profound biases by superpower as to 'when and who' should possess a nuclear program. Iran's nuclear security can be applied to the Copenhagen theory of international relations. The

primary framework under Copenhagen is to focus on the aspect of security and its implications on state behavior as well as foreign policy. Security best understood simply as the condition of being free from threats or danger is a rather broad concept that tales into various levels from regional security, sociological and environmental and political.

This approach seeks to highlight key differences with realism which only focuses on power as the main instrument to achieve security as well as the state as the main unit to be granted security. Realism generalizes security into a wholesome concept thus fails to accurately offer reasons behind certain state actions that are based on more detailed aspects of security with the state concerned. Due to this loophole in realism, the theory runs the risk of being outdated and offers a shallow view of world politics. The solution offered are not a one size fit all but it captures the ignored components of security that helps in the study of international relations. Iran security concerns should be viewed from three levels of analysis and five security sectors. The first level regards Iran's security from an individual perspective, secondly is the state level perspective and lastly is the international level perspective. All of these three levels operate on one or more of the five security sectors which are based on Iran's environment, economics, and politics, society and lastly military structures. Security levels and security sectors are connected through a network of events and policies such that each cannot operate in isolation. Understanding Iran's security from an individual perspective entails that the condition of individual life such as health, economic wellbeing, status, political rights such as freedom have an effect on the domestic and international policies crafted in Iran.

Therefore, any danger to the conditions of life of individuals in Iran cans be regarded as a threat by the state which must be mitigated or regulated through necessary policies including development of nuclear programs. To understand the link between individual security and nuclear program development one has to understand the five sectors of security. Economically, nuclear programs are a form of employment creation considering the massive labor forces needed to run such projects on a national scale. Politically the nuclear program offers social status to Iranian citizens and generates high sense of national identity as Iran is viewed as a technologically developing and emerging state. Nuclear programs are thus related to economic development. Threats to human security become threats to national security as the citizen is at the core of the state and makes up the state of Iran.

Political security is much tied to state level of security. Iran's political security can be argued to have been derived from nuclear program as such large-scale projects offers a state respect and even generates fear among other states as to the scope and nature of the nuclear program. Iran with a nuclear program especially for military purposes is likely to have more political control, influence, power and authority regionally an internationally by offsetting the balance of power and tilting it in her favor since control as very feel states possess such a capability with exception of India and Pakistan and Israel. Iran requires political, economic and military leverage to have a more effective role in the decision making at the international stage and all these seem to be offered by way of nuclear programs. Thus, Iran might see a purposive reason to have nuclear program as far much beneficial than not having one. This might also explain why the permanent members of the UNSC are all

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²⁰³ Barry Buzan, "New Patterns of Global Security in the Twenty-First Century", *International Affairs*, (1944-) 67, 3 (1991), pp. 431-451.

nuclear marred states. All sectors have a bearing on levels of security's which in turn determines a state priority in international politics. A more interesting argument is the link between the sectors and the concept of threats.

Economic security in Iran should not be viewed in terms of threats only but also in terms of opportunity. Economic security can refer to sound financial wellbeing at the state level. States with strong economies are more capable of undertaking expensive projects such as the USA and Russia during the industrial revolution. Iran has enjoyed a relatively sound economy with competitive trade figures and healthy GDP in the region backed by the oil industry, the state has been able to generate billions of dollars that can easily be channeled into other development projects including nuclear programs. Threats and opportunities of an economic nature are relatively difficult to investigate due to economic manipulation of fiscal and monetary policies by states of which Iran cannot be excluded. To base research findings on the economic indicators as drivers of nuclear proliferation alone one may run the risk of over simplifying a very much complicated subject. Nonetheless economics might explain why Iran pursues a nuclear program since it has a sound economic structure able to facilitate the costly research and development of nuclear weapons.

Environmental security has become a very important subject due to the green revolution whereby states are shifting towards cleaner forms of energy as opposed to pollution and climate change threats like the use of fossil fuels and unclean sources such as petrol and oil. States that depend on oil industries are beginning to notice the increased risks of over dependence on single market commodities. In case global

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²⁰⁴ Richard Rauchhaus, Michael Kroenig, Etel Gartzke, *Causes and Consequences of Nuclear Proliferation*. (New York: Routledge Press, 2006). p. 20.

decline in oil prices or the availability of cleaner fuel, these states tend to run the risk of facing economic crises as their economies depend on oil. Saudi Arabia has begun diversifying its economy and reducing over reliance on oil by opening investments in other sectors such as property and tourism and well as holding gold and foreign and bonds in foreign reserves.

Iran is no exception as an oil producing state it is more beneficial to have other forms of sustainable energy in the future including peaceful nuclear energy which Iran is already entitled to have under the NPT. Due to environmental reasons, certainly Iran would be in better position with nuclear energy than with oil in the next fifty years. However, states are notorious for hiding their nuclear plans under the disguise of peaceful energy when in fact they project serve other motives. Therefore, researches should not conclude that this is the main reason why Iran is pursing nuclear programs but only one probability amongst many.

The right to social security is cherished in many countries and Iran is not an exception. There is a strong connection between political and social security therefore the two cannot be isolated. States with strong social security tend to have more robot political systems.²⁰⁵ Iran as a state is made up of citizens each having a national identity. This identity can be expressed in the form of shared religious beliefs and patriotism. The type of government in Iran was formed through a popular vote thus citizen have an indirect impact on the kind of administration which is elected to govern the masses this also affects the types of domestic and foreign policies the state will craft and implement.

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²⁰⁵ Rauchhaus, Kroenig, Gartzke, Causes and Consequences of Nuclear Proliferation, p. 44.

The vast number of global conflicts are a result of social differences such as the Syrian civil war between ISIS and the Assad monarchy as well as the perpetual threat of war between North Korea and South Korea which is mostly a social identity conflict as to who is the 'genuine Korean'. When such a variable is taken onto the case of Iran it can be argued that Iran's nuclear program seeks to maximize the state's power as a Shia Islamic republic with an 83% Shia majority population in relation to other regional Sunni Muslim states like Saudi Arabia and Iraq. This might explain why Saudi Arabia supported Iraq in the 1980-1988 war against Iran. Conflicts are bound to happen due to differences in culture and civilizations which in turn determine threats, vulnerabilities, foes and allies between Iran and actors like Saudi Arabia and the USA.²⁰⁶

Cultural and social differences shape the global system therefore this sector of security ought to be applied to the case of Iran. The major problem however is that the concept of social security is rather broad to investigate at the international system due to the various cultures in existence today. Several questions can be raised as to which culture is preferable over another. Civilizations determine types of government this explains why the USA is more liberal state with a democratic nature as opposed to Iran which more theocratic and patrimonial. States with difference civilizations are more likely to clash on a global level although opportunities for cooperation can exist. The realist argued against the value of morals and social values in international politics as of less significance to the behavior of states this proposition seem to neglect the most important unit from which states are formed which is the individual citizen.

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²⁰⁶ Paul Ashley, *The Iranian Nuclear Program: Realist vs. Constructivist Models*, (Wellington Inc, 2012), pp. 14-17.

Another important sector of security is regional security this approach investigates the concept of security on a regional level which is a subset of the international level of analysis offered by the researcher. The sector can be argued to be the intermediate between the state and the international system. In order to comprehend international relation, it is critical to understand the politics, forces, actors and nature of regional structures as they determine the conduct of states in the region and internationally. Regions are present member states with many unique opportunities and threats. These pros and cons determine what states do in response to the challenges presented therefore. The Middle East has been marked by series of instability for decades with the Iran-Iraq war of 1980s, the 1990 Iraq-Kuwait war, the civil wars in Yemen, Afghanistan, Syria, Pakistan and the ongoing Israeli–Lebanese conflict which started in 1948.

The pursuit of nuclear programs in Iran drew regional and international attention and the issue became a major diplomatic and political challenge since the early 2000s. Whether the program is peaceful or not there is no doubt that the program challenges the status quo and threatens the balance of power in the region. The Middle East has been a very fragile region for years and therefore Iran emerging as a nuclear power would further destabilize the region's geopolitical landscape. The Gulf Cooperation Council (GCC) member states have shown greater concern and worry about the nuclear program forcing them to refine their foreign policies using instruments ranging from accommodation to outright antagonism with even the possibility of obtaining counterbalance nuclear deterrent capabilities on the table.

Uncertainty has become the order of the day in the Middle East as to what dimension does the Iran nuclear program possess. Military dimensions of the nuclear program remain ambiguous and unproven although they are a probability. Nonetheless regional tension has increased ever since the inception of the programs irrespective of the fact the regime in Iran as consistency assured other states that the program does not carry any military threat and is solely meant for civilian energy. Several researchers made attempts to investigate the regional implication of the nuclear program in Iran with several approaches concluding that the issue will lead to inevitable conflicts. Nuclear programs especially those with a weapons dimension tend to balance the power matrix as seen by the Cold War passive conflict between USSR and the USA. This is so because of the concept of mutually assured destruction whereby no actor will emerge victorious in the event of a nuclear war but rather damage will be almost mutual.

Nuclear weapons might also cause an arms race that can be more lethal and leads to further regional instability as opposed to them having a positive balancing of power effect. In the event that Iran acquires nuclear weapons there is a high probability of regional shock as the geostrategic balance of power tilts disproportionally in the favor of Iran at the expense of other regional players. For instance, deterrence measure between Iran and Israel are likely to cause a serious security dilemma. Regional defense policies of Iran might seem offensive to the GCC member states as well as to Israel resulting in more conflicts. The GCC member states perceive İran to be hostile and these include Kuwait, Bahrain, Oman, Saudi Arabia, United Arab Emirates and Qatar. These states are more likely to develop a joint counter threat formation that triggers more instability considering the magnitude of the players

involved. This is because states tend to naturally react to an emerging power by counter balancing the perceived 'aggressor' as opposed to appearing it.

The capabilities of the GCC members states as well as Israel to respond to a threating Iran is quite remarkable. Oil rich GCC states possess a combined economic capacity to fast tract the possibility of counter nuclear proliferation measures if they seek to. Israel on the other hand as significant political, financial and military back up of the USA and the EU since these players already regard Iran as problematic. This means a conflict between Israel and Iran would not only be regional but would extend into the international system politically, economically and militarily with a potential preemptive strive coming from Israel.

While these events might seem disconnected they have a serious bearing on regional security and they shape the security outlook of regional players. Pakistan has nuclear weapons and possesses a threat to regional players who may regard the state as having high security leverage over other states like Iran. Thus, Iran will either form a security community with allies in the region based on shared interested and mutual trust or she will regard the region as a conflict formation whereby there is high suspicion and fear and limited cooperation. The security community of Iran includes allies such as Syria, Lebanon and the Palestinian Authority. Iran's defense policies are more favorable towards these states and entities. On the other side Iran, will have a conflict formation with regional players such as Israel and Saudi Arabia which in turn determines types of defense polices Iran might purse including a nuclear program with a military dimension. A nuclear weapons program provides a security deterrent that might protects Iran in cases of attacks which could be one of the

reasons why the state has a nuclear program.

All factors being taken into account there is more proof that supports the conclusion that a nuclear armed Iran could drastically alter the balance of power in the region and threat the already fragile region into further turmoil and conflict. Fears of hegemonic conduct by Iran and expansionist ambitions through the support of none state hostile actors could create new security dilemmas capable of initiating a regional arms race if not an international arms race. Broken and weak diplomatic channels could lead to more suspicion and high probability of preemptive strikes by regional and global players who are hostile to Iran.

In the final analysis, the causes of the Iran nuclear program are much more complex than this research effort could ever present. However as shown there are clues that can be derived from the theoretical frameworks such as a realism, constructive and Copenhagen. The strength of realism is based on the notion that the state is the main actor in international relations thus narrows down the research to one major unit of analysis. Survival proves that states are willing to do whatever it takes to have an edge in an anarchical system. The break of realism into defensive and offensive categories is an effective way to understand the behavior of conservative superpower who tend to maintain the status quo as opposed to aggressive emerging stares or rivals who tend to seek a redress of the status quo. The Iran nuclear program has a much more realist dimension than can ever be imagined due to the nature of international attention the policy has attracted implying that states regard the program as a game change of some sort in the Middle East.

However, realism fails to capture the internal factors of the state which makes a clearer analysis in understand date behavior. Constructivism tends to fill in the loopholes left by realism such as the discussion on the domestic actors and variable responsible for the behavior of a state at the international level. The only risk that constructivism faces is running the risk of over analyzing and complicating research through introduction of domestic variables such as culture and religion as a factor in understanding state behavior. Constructivism fails to capture the structure of the international system thus does not provide a clean framework of the playing field on which states operate.

While constructivism and realism answers specific questions about internal and external factors, the Copenhagen approach tends to be the bridge between the two theories. By introducing the notion of security and its various levels as well as sectors, the Copenhagen approach reveals that the Iran nuclear program becomes a much more understandable from a security perspective rather than a constructive notion or a state centric paradigm alone. It is important to note that the realist theory has more merits in explaining the causes of the nuclear program in Iran and therefore even if no theory should be used in isolation, some theories tend to have an edge over others. It might also be prudent for further researchers to add upon this work as a starting premise to better understand factors influencing nuclear proliferation in Iran. However, in general the nuclear proliferation in Iran has a domestic and international cause to it which involves a complex network of variables such as state interest, economics, social structures, regional politics and security complexes. Ultimately the nuclear program also has an impact on regional security as a whole.

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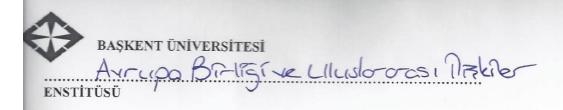
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YÜKSEK LİSANS / DOKTORA TEZ ÇALIŞMASI ORİJİNALLİK RAPORU

Tarih: 03/01/2017

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Tez Başlığı : Understooling and Investigating has Nucle

Uygulanan filtrelemeler:

- 1. Kaynakça hariç
- 2. Alıntılar hariç
- 3. Beş (5) kelimeden daha az örtüşme içeren metin kısımları hariç

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