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Nuclearization of the Middle East and Turkey's Possible Responses

Does Turkey need to be reassured that
it does not need to develop nuclear weapons?

Prof. Dr. Mustafa Kibaroglu

Chair of the International Relations Department &
Director of the Center for Eurasian Studies, Okan University

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Executive Summary

Assertions are regularly made that Turkey could make the decision to obtain nuclear weapons in response to the nuclearization of the Middle East in general and a nuclear weapons capable Iran in particular. It is feared that Turkey might think about a path like Iran has followed.

In connection with the question whether Turkey would reevaluate its commitments under the NPT and consider treaty withdrawal to go nuclear, or pursue a hedging strategy through the acquisition of dual-use nuclear technology while remaining in the NPT as a non-nuclear weapon state, it must be noted that the fundamental thrust of Turkish foreign and security policy has been to become a state party to international arms control and disarmament agreements, wherever appropriate, so as to contribute to their effective implementation. Moreover, Turkey endorsed efforts to strengthen the nuclear non-proliferation regime and the verification mechanism of the IAEA.

With or without the incitement of Iran's nuclear program, Turkey may theoretically be seen as a powerful candidate to seek nuclear weapons development capability. But a host of reasons militate against such an option. Before everything else, it must be noted that virtually no state has developed nuclear weapons capability without substantial support and effective cover from a superpower or from a scientifically and technologically advanced country.

Hence, one particular condition for Turkey to go nuclear, either clandestinely by staying in the NPT, or by walking out of the treaty, would be to secure the endorsement of such a power, which, however, is not on sight nowadays. Short of such a supporting power, the only possible way of meeting the scientific and technological requirements would be through an illegal network similar to that of Abdel Qadeer Khan, the "father of Pakistani bomb," now under house arrest in Pakistan. The magnitude and the scope of illegal acquisition would be extremely difficult, if not impossible, in a country like Turkey, where there are relatively small but highly effective groups of concerned people who would do their best to reveal such critical information to the world. Should such a development take place, Turkey would be treated like a "rogue state," something unthinkable and unacceptable, given the past record of Turkey in its non-proliferation efforts mentioned above.

Even from this perspective, the author sees no feasible scenarios under which nuclear weapons would bring additional security to Turkey. On the contrary, any attempt to illegally pursue, let alone acquire, nuclear weapons capability would be extremely damaging to Turkey's vital interests.

Against this backdrop, one should not expect Turkey to embark upon a nuclear weapons program, even if Iran crosses the critical threshold of nuclear weapons development capability. Should this happen, however, what will keep Turkey away from nuclear weapons will not simply be its responsible state practice. Also there are significant limitations arising from Turkey's institutional liabilities, such as its adherence to the nonproliferation regimes, membership in the North Atlantic Treaty Organization (NATO), and its European Union vocation.

The extent of the willingness and the ability of Turkey's friends and allies to mitigate its fears that emanate from the worsening security situation in the region will also have a decisive effect on Turkish policy makers. Improving relations with the United States and the European Union as well as strengthening the nuclear non-proliferation regime will make the greatest impact in this regard.

Introduction

Turkey's renewed bid for the construction of a nuclear power plant, after decades of failed attempts to bring nuclear technology to the country, coincided with an increasing interest in nuclear power projects in several Middle Eastern states. Not surprisingly, these developments brought up the question of "nuclearization" of the Middle East, which caused concerns in the West about a "proliferation cascade" throughout the region.¹ The West fears that if Iran's nuclear ambitions cannot be thwarted and the Mollas acquire the bomb, other regional countries such as, Egypt, Syria and Saudi Arabia would like to join the bandwagon of proliferators. In the same vein, Turkey's nuclear aspirations have also become subject to questions with particular reference to the potential impact of Iran's nuclear program on Turkey's foreign and security policies.

Turkey is carefully monitoring the nuclearization of the Middle East in general and the advances in Iran's nuclear program in particular. Turkish officials try to determine alternative policies to minimize the possible negative effects of the eventual weaponization of Iran's nuclear program to Turkey's national interests and security. There exists, of course, a wide range of views among Turkish scholars, experts, and politicians as well as diplomats and military officials as to what should be Turkey's policy options as regards the possibility of Iran's acquisition of nuclear weapons. Views extend from those who suggest that Turkey should consider having the basic capability and the necessary infrastructure for nuclear energy generation only, to those who strongly advise that Turkey should go down the same path as Iran and develop nuclear weapons manufacturing capability (e.g., uranium enrichment and plutonium reprocessing) in case the nuclear nonproliferation regime fails to prevent countries like Iran from developing nuclear weapons, or collapses altogether.

In addition to a multitude of views expressed generally in unofficial settings as "personal opinions", Turkey's official stance has been pronounced from the highest levels of the state apparatus. In their official statements, top Turkish politicians express, among other things, their concerns about the increase in the number of states in the Middle East that already possess, or may soon develop, the capability to build nuclear weapons, and they specifically emphasize the need for the creation of a nuclear weapons-free zone (NWFZ) in the region, in addition to other international efforts that aim to achieve universality of the nuclear nonproliferation regime. It is, therefore, ironic to note that, while, on the one hand, there are concerns especially in the West about Turkey's possible reactions to the nuclearization of

¹ The term "proliferation cascade" is commonly used among the proliferation experts who believe that due to the advances in Iran's nuclear program it is highly likely that several other states in the Middle East will initiate their own nuclear programs in order to counter Iran's growing weight in the region.

the Middle East by “going nuclear”; on the other hand, Turkey has its own concerns about the threat of nuclear proliferation in its immediate neighborhood.²

With these in mind, this paper will first give an overview of the profile of nuclearization in the Middle East by a number of countries that have reached various levels of achievements in their initiatives, and the potential for proliferation that concerns Turkey as well as its western allies. The paper will then try to shed light to Turkey’s nuclear aspirations by giving an account of its decades-long attempts to benefit from nuclear energy projects that have not come to fruition due to, primarily, fears of the western countries, the United States being at the forefront, on the grounds that Turkey would eventually divert its nuclear capabilities to military purposes. Having explored Turkey’s nuclear adventure since the late 1960s and onwards, a section will present different perspectives about how Iran’s nuclear program is seen in the Turkish public domain, in the scholarly and bureaucratic circles, and among the political elite. Turkey’s official stance towards the Iranian nuclear program will also be mentioned in this context.

The fundamental question that is on the mind of most western security analysts is whether the apparent nuclearization of the Middle East, with particular emphasis on Iran’s nuclear program, is likely to cause Turkey to go down the same path that may end up joining the rank of proliferators. In order to elaborate on the possible reactions of Turkey to the nuclearization of the Middle East, a section will be devoted to a brief discussion about Turkey’s institutional liabilities, such as memberships in the WMD nonproliferation regimes; alliance relations with NATO; and candidacy to the European Union, which are supposed to constrain Turkey’s behavior. Then, the flip side of the coin will also be discussed with references to the shortcomings of the nuclear non-proliferation regime; the failures in NATO’s living up to its commitment to Turkey; and the unequal treatment of Turkey’s candidacy by the EU that weaken the constraints in the area of Turkey’s institutional liabilities.

Then, two critical questions that are frequently asked to the author with regard to Turkey’s nuclear future will be opened to a discussion: “would Turkey make the decision to obtain nuclear weapons in response to a nuclear Iran and NATO tactical nuclear weapons being withdrawn?” and “under what circumstances could Turkey reevaluate its commitments under the NPT and consider treaty withdrawal to pursue nuclear weapons?” The paper will conclude with a discussion about whether Turkey would need to be reassured that it does not need to develop nuclear weapons.

² The term “going nuclear” is usually understood as a country’s (secret) desire to develop nuclear weapons first by acquiring nuclear scientific and technological capabilities ostensibly for peaceful purposes that would later be diverted to military purposes. The term has gained much prominence after the book of Leonard Spector, a leading nonproliferation expert with the James Martin Center for Nonproliferation Studies of the Monterey Institute of International Studies in Monterey, California, USA. See Leonard S. Spector, *Going Nuclear*, Bullinger Publishing Company, Cambridge, MA., 1987.

A Profile of Nuclearization of the Middle East

It goes without saying that the nuclearization of the Middle East has begun with the nuclear program of **Israel** as early as the 1950s that has eventually gained Israel the capability to build its “nuclear option”, which is believed, at least in Israel, to have provided a strong deterrent against its Arab neighbors.³ Yet, the Israeli nuclear weapons capability is neither confirmed, nor denied by Israeli authorities as part of their longstanding official state policy of “ambiguity”.⁴

Nuclearization of the Middle East has gained further momentum with **Iran**, which has signed the Agreement for Cooperation Concerning Civil Uses of Atoms with the United States in 1957. Accordingly, the American Machine and Foundry (AMF) supplied Iran with a pool-type 5 MW reactor and its fuel in September 1967. In March 1974, the Shah announced plans for developing 23,000 MWe of nuclear power capacity “as soon as possible.” On March 3, 1975, Iran and the United States signed a 15 billion-dollar agreement for the construction of eight nuclear reactors having a total capacity of 8,000 MWe. The same year, Iran signed contracts also with the French company Framatome to build two 950 MWe pressurized water reactors (PWR) and the site preparation work began in Darkhovin. In 1975, Iran purchased a 10 percent share in the uranium enrichment company, namely Eurodif, which was a joint venture between France, Belgium, Spain, and Italy. Similarly, Germany and Iran reached an agreement in 1976 for the establishment of six nuclear power reactors in Iran; the first two were to be built by German Kraftwerk Union (KWU) in Bushehr, each housing Siemens 1,300 MWe reactors.⁵

The Islamic Revolution in 1979 stalled Iran’s nuclear projects. The United States stopped cooperating with Iran in the nuclear field and pursued a “policy of denial” by putting pressure on other countries not to transfer nuclear technology to Iran. Yet, in the 1980s China built the Esfahan Nuclear Research Center which was opened in 1984.⁶ With Chinese assistance, fuel fabrication and conversion facilities, which are crucial for uranium enrichment, were built also in Esfahan. Iran also signed a nuclear cooperation accord with Russia on January 8, 1995 in Tehran. Russia agreed to complete the construction of Block No. 1 at the Bushehr nuclear power plant. The Russia-Iran nuclear deal would cost nearly 1 billion US dollars, and the first of the two Russian-designed VVER-1000 reactors was

³ Seymour M. Hersh, *The Samson Option*, Random House, New York, 1991; Avner Cohen, *Israel and the Bomb*, Columbia University Press, New York, 1998.

⁴ Shai Feldman, “Israel,” in Mitchell Reiss and Robert S. Litwak (eds.), *Nuclear Proliferation after the Cold War*, The Woodrow Wilson Center Press, Washington D.C., 1994, pp. 67-88.

⁵ Mustafa Kibaroglu, “Good for the Shah, Banned for the Mullahs: The West and Iran’s Quest for Nuclear Power,” *Middle East Journal*, Spring 2006, Vol. 60, No. 2, pp. 207-232.

⁶ Mustafa Kibaroglu, “Is Iran Going Nuclear?” *Foreign Policy Quarterly*, December 1996, Vol. 20, No. 3 - 4, pp. 35-55.

originally planned to become operational by 2001.⁷ The first Iranian nuclear power reactor in Bushehr started operation in April 2012, more than a decade later than was originally estimated.

Iran's nuclear program tops the world political agenda, especially since the revelations in 2002 about the large-scale uranium enrichment facility in Natanz, and the heavy-water reactor in Arak, both of which were long under construction without the knowledge of the International Atomic Energy Agency (IAEA). Foreign Ministers of three European countries, namely the United Kingdom, France and Germany, also known as the "EU-3", took the initiative to visit Tehran in late 2003 in order to prevent a confrontation between the United States and Iran due to Iran's "violation" of its obligations under the Treaty of Non-proliferation of Nuclear Weapons (NPT) of 1968, as argued by the American officials and experts. Following that short-lived attempt, the Iran dossier is brought before the United Nations Security Council (UNSC) by the IAEA in 2006 due to a lack of enough cooperation by Iran in shedding light to a set of outstanding issues which need to be clarified by the Agency. Over the last few years, a series of negotiations have been taking place between the Iranian authorities and the representatives of five permanent members of the UNSC and Germany, also known as the "P5+1" countries, whose results, if any, are yet to be seen.⁸

Iraq, among all the other Middle Eastern countries, was said to have advanced its capability in the 1980s causing serious fears in the West regarding whether Saddam Hussein would have the bomb by the mid-1990s.⁹ The first Gulf War in March 1991 that followed Iraq's invasion of Kuwait in August 1990 resulted, among others, "destruction, removal or rendering harmless" Iraq's nuclear infrastructure by the IAEA as was envisaged in the UNSC Resolution 687 of April 03, 1991 in its paragraphs 7 thru 9 as well as 12.¹⁰ Since then, the Iraqi nuclear capability is almost non-existent in terms of production facilities or research

⁷ Mustafa Kibaroglu, "An Assessment of Iran's Nuclear Program" *Review of International and Strategic Affairs*, Spring 2002, Vol. 1. No. 3, pp. 33 -48.

⁸ Mustafa Kibaroglu, "The Iranian quagmire: How to move forward; Position: Resuscitate the nuclear swap deal," *Bulletin of the Atomic Scientists*, November/December 2010, Vol. 66, No. 6, pp. 102-108.

⁹ Gary Samore, "Iraq," in Mitchell Reiss and Robert S. Litwak (eds.), *Nuclear Proliferation after the Cold War*, The Woodrow Wilson Center Press, Washington D.C., 1994, pp. 15-31.

¹⁰ Paragraph 12 of the UNSC Resolution 687 (1991) reads as follows The UNSC "Decides that Iraq shall unconditionally agree not to acquire or develop nuclear weapons or nuclear-weapons-usable material or any subsystems or components or any research, development, support or manufacturing facilities related to the above; to submit to the Secretary-General and the Director-General of the International Atomic Energy Agency within fifteen days of the adoption of the present resolution a declaration of the locations, amounts, and types of all items specified above; to place all of its nuclear-weapons-usable materials under the exclusive control, for custody and removal, of the International Atomic Energy Agency, with the assistance and cooperation of the Special Commission as provided for in the plan of the Secretary-General discussed in paragraph 9 (b) above; to accept, in accordance with the arrangements provided for in paragraph 13 below, urgent on-site inspection and the destruction, removal or rendering harmless as appropriate of all items specified above; and to accept the plan discussed in paragraph 13 below for the future ongoing monitoring and verification of its compliance with these undertakings".

centers. However, scientific knowledge as well as technical and technological expertise in the nuclear field accumulated over a long period since the 1970s partly remains among the scientist, scholars and experts who could survive the two wars and the large-scale insurgency in the country since the fall of the Saddam regime in 2003.

Libya, just like Iraq, has long been a source of worry for the nonproliferation community due to its involvement in the Weapons of Mass Destruction (WMD) development programs, including the nuclear program that was generally believed to have been developed solely for military purposes.¹¹ However, then Libyan leader Muammar Gaddafi agreed in 2003 to dismantle his country's WMD programs under the international supervision via the international organizations such as the IAEA. Libya has not been on the radar screen of nonproliferation experts and scholars ever since with respect to the nuclear issues.¹²

Egypt acquired its first nuclear reactor from the Soviet Union in 1961.¹³ Even though Egypt was said to have had the decision to build nuclear power plants during the presidency of Anwar Sadat in the 1970s, and sought cooperation with a number of countries such as Germany, the United States, Russia, India, China, and Argentina as well as United Kingdom and India, no significant achievement is known to have been made. On October 29, 2007, then President Hosni Mubarak announced that Egypt, which lacks oil reserves, would build several nuclear power reactors to meet the rising energy demands.¹⁴ Mubarak also announced that nuclear power was an "integral part of Egypt's national security" while also promising that the country would not seek nuclear weapons.¹⁵

Historically, Egypt's nuclear program appears to strike a delicate balance of championing nuclear nonproliferation in the Middle East and developing civilian nuclear industry to address its energy needs, while at the same time seeking some guarantee of security against Israel.¹⁶ Yet, in 2004, the IAEA identified several open source documents published by the Egyptian Atomic Energy Agency that indicated the possibility of unreported nuclear material, activities and facilities in Egypt.¹⁷ In December 2004, Egypt acknowledged that between

¹¹ Frank Barnaby, *How to Build a Nuclear Bomb*, Granta Books, London, 2003.

¹² Shahram Chubin, "The Middle East," in Mitchell Reiss and Robert S. Litwak (eds.), *Nuclear Proliferation after the Cold War*, The Woodrow Wilson Center Press, Washington D.C., 1994, pp. 33-66.

¹³ The two megawatt reactor was opened by President Gamal Abdel-Nasser at Inchass, in the Nile Delta. <http://www.fas.org/nuke/guide/egypt/nuke/index.html>

¹⁴ Jeffrey Fleishman, "Egypt to Build Nuclear Power Plants to Meet Energy Demands", *Los Angeles Times*, October 30, 2007. <http://www.boston.com/news/world/middleeast/articles/2007/10/30>.

¹⁵ "Egypt Announces Nuke Power Plants Plans - President Mubarak Says Nation Should Diversify Energy Sources; U.S. Willing To Help", CBS News, October 29, 2007.

<http://www.cbsnews.com/stories/2007/10/29/world/main3422950.shtml>

¹⁶ Barbara M. Gregory, "Egypt's Nuclear Program: Assessing Supplier-Based and Other Developmental Constraints", *Nonproliferation Review*, Fall 1995, pp. 20-22.

¹⁷The comprehensive safeguards agreement between Egypt and the IAEA entered into force on June 30, 1982. IAEA Safeguards Statement 2004, p. 9, paragraph 38, <http://www.iaea.org/OurWork/SV/Safeguards/es2004>.

1990 and 2003 it has conducted experiments, which had not previously been reported to the Agency, involving the irradiation of small amounts of uranium and thorium and their subsequent dissolution. Egypt also acknowledged that it had failed to include laboratories and some imported and domestically produced nuclear material in its initial declaration. Corrective actions were taken by Egypt, which has cooperated with the Agency and provided information and access to personnel and locations. Although Egypt's activities were not prohibited under the NPT, it was obligated to report them to the IAEA under their 1982 safeguards agreement. Their failure to do so raised questions as to the full extent of scientific activity that has taken place in Egyptian laboratories and what these facilities may be capable of doing.¹⁸

Syria had plans in the 1980s to build a reactor, which were reportedly abandoned after the Chernobyl accident soon followed by the collapse of the Soviet Union, Assad regime's major ally and supplier of technology as well as arms. With escalating oil and gas prices, nuclear power is said to be considered in Syria again.¹⁹ Syria has become a source of concern in the aftermath of the Israeli air raid on September 6, 2007 against the small nuclear reactor, namely the *al Kibar* that was built in the central-eastern part of the country near the Euphrates River in the 2001-2007 timeframe with the help of North Korea. Reports indicate that "Syria was building a gas-cooled graphite-moderated reactor that was nearing operational capability in August 2007. The reactor would be capable of producing plutonium for nuclear weapons. It was not configured to produce electricity and was ill-suited for research."²⁰ There were also reports indicating that there was "sustained nuclear cooperation between Syria and North Korea."²¹

Jordan has displayed willingness to invest in nuclear power projects. In January 2007, King Abdullah II told the Israeli newspaper *Haaretz* that "the rules have changed" and that "everybody's going for nuclear programs".²² In mid-2008 an agreement between the Jordan Atomic Energy Commission (JAEC) and Atomic Energy of Canada Ltd (AECL) with SNC-Lavalin was signed in order to conduct a three-year feasibility study on building an AECL 740 MWe Enhanced CANDU-6 reactor using natural uranium fuel, for power and desalination. Jordan's Committee for Nuclear Strategy has set out a program for nuclear power to provide 30% of

¹⁸ Mustafa Kibaroglu and Baris Caglar "Nuclear Energy Development and Proliferation Concerns in the Middle East," *ORIENT*, Spring 2008, pp. 11-18.

¹⁹ Shannon N. Kile, "Proliferation concerns in Syria and Myanmar", *SIPRI Yearbook 2010*, Stockholm International Peace Research Institute, Stockholm, 2010.

²⁰ David Albright and Paul Brannan, "ISIS Report: The Al Kibar Reactor: Extraordinary Camouflage, Troubling Implications," Institute for Science and International Security, May 12, 2008, www.isis-online.org; Anthony Cordesman, "An Overview: Syrian Weapons of Mass Destruction," Center for Strategic and International Studies, June 02, 2008, www.csis.org.

²¹ *Background Briefing with Senior U.S. Officials on Syria's Covert Nuclear Reactor and North Korea's Involvement*, April 24, 2008, p. 4. See the website of the federation of American Scientists www.fas.org.

²² Akiva Eldar, "King Abdullah to Haaretz: Jordan aims to develop nuclear power," *Haaretz*, January 19, 2007; <http://www.haaretz.com/news/king-abdullah-to-haaretz-jordan-aims-to-develop-nuclear-power-1.210546>.

electricity by 2030 or 2040, and to provide for exports.²³ During a regional tour to Saudi Arabia, Oman and Jordan, in April 2007 then IAEA Director-General Mohammed El Baradei reiterated the Agency's readiness to "help Jordan to benefit from nuclear energy for peaceful purposes" and said that an IAEA team would be dispatched to look into Jordan's plans.²⁴ In April 2012, the Jordanian government short listed Areva and Rosatom to running competitive negotiations in parallel. Rosatom is expected to offer its 1,000 MWe VVER, a conventional pressurized water reactor, which is its primary nuclear export. Areva is teaming with Mitsubishi to offer a new 1,000 MWe reactor design. Jordanian government sources have told wire services they hope to sign with a vendor by the end of 2013 or sooner.²⁵

The Gulf Cooperation Council (GCC) countries, namely, Bahrain, Kuwait, Oman, Qatar, Saudi Arabia, and the United Arab Emirates have already announced their interest in a possible shared nuclear program. Hence, the **United Arab Emirates** (UAE) has signed a 20 billion dollar deal with South Korea in December 2009 for the construction of a nuclear power plant, which will host four reactors each having 1,200 MWe capacities, giving a total installed capacity of 4,800 MWe, once completed. In parallel with this nuclear reactor deal with South Korea, UAE has agreed separately with the United States, the so-called "123 Agreement", not to develop capabilities to enrich uranium or to reprocess plutonium. These are the two sensitive technologies that are needed for developing a self-reliant indigenous capability to build nuclear weapons, acquisition of which cause serious proliferation concerns.

Saudi Arabia declared in January 2007 by its Foreign Minister Prince Saud Al Faisal that any nuclear program would be developed "under strict controls and with peaceful intentions, to be an example for any country seeking to adopt the technology without any intention to join the nuclear arms race".²⁶ Until then, the leaders of Saudi Arabia used to tell the world that they could foresee no need for the Kingdom to develop nuclear power.²⁷ Today, Saudi Arabia is reportedly scrambling to hire atomic contractors, buy nuclear hardware and build support for a regional system of reactors.²⁸ One particular issue, which is being discussed among the

²³ Boonchawee Srimok and Luke Westfield II, *Case Study 2 Progress Report (Jordan)*, NE591, Nuclear Nonproliferation and Safeguards Technology and Policy, Spring 2010, pp. 8-10.

²⁴ Jamal Halaby (AP), "More Mideast States Eyeing Nuclear Power-On Mideast Visit, U.N. Nuclear Chief Finds Interest in Developing New Nuclear Programs", *ABC News*, April 15, 2007. <http://abcnews.go.com/International/wireStory?id=3044014>

²⁵ Dan Yurman, "Update on Jordan's Nuclear Program" posted on June 7, 2012. <http://theenergycollective.com/dan-yurman/86819/update-jordans-nuclear-program>.

²⁶ World Nuclear News (WNN), *Nuclear Energy an Option for Gulf States*, April 11, 2007, http://www.world-nuclear-news.org/nuclearPolicies/110407Nuclear_energy_an_option_for_Gulf_states.shtml.

²⁷ Mustafa Kibaroglu and Baris Caglar "Nuclear Energy Development and Proliferation Concerns in the Middle East," *ORIENT*, Spring 2008, pp. 11-18.

²⁸ http://www.nytimes.com/2007/04/15/world/middleeast/15sunnis.html?_r=1&oref=slogin; For Saudi Arabia's nuclear calculations, see Gawdat Bahgat, 'Nuclear Proliferation: The Case of Saudi Arabia', *Middle East Journal*, Vol. 60, No. 3, Summer 2006, pp. 421-43; Richard L. Russell, 'A Saudi Nuclear Option?', *Survival*, Vol. 43, No. 2, Summer 2001, pp. 69-80; and Akaki Dvali, 'Will Saudi

nuclear proliferation experts, is whether Saudi Arabia will agree to similar terms that UAE has agreed with the United States. Saudi Arabia is apparently not very enthusiastic toward the idea of foregoing the option to develop capabilities to enrich uranium or to reprocess plutonium that are not necessarily banned by the NPT.

Qatar is also said to have plans for building nuclear power plants. But, it is seemingly not at the point of making a clear-cut decision yet about going ahead with the nuclear option for energy generation purposes.

Turkey's Long Quest for Nuclear Power

The above background note on the current level of nuclear power development projects that gained further momentum since recently across the Middle Eastern region suggests that advances in the Iranian nuclear program have clearly prompted the regional states to take a series of measures in order to balance Iran's growing military capabilities and its political weight in regional affairs. By coincidence, Turkey's nuclear power plant deal with Russia, which is signed in 2010 for the construction of four 1,200 MWe VVER pressurized water reactors, came at a time when the fears of nuclearization of the Middle East are heightened in the West with regard to the possibility of a proliferation cascade. Hence, the Russian deal raised serious questions regarding Turkey's true intentions in the nuclear field as well.

Rationale for nuclear energy

Turkey is a rapidly growing country with a population of approximately 75 million and whose energy needs at present and forecasted for the future extend well beyond its currently installed power generating capacity.²⁹ Turkey does not have significant reserves of oil or natural gas; therefore, it is dependent on other countries. Despite an outstanding success in completing power generation projects in the 1970s and 1980s, Turkey suffered in the 1990s from frequent power outages, which caused serious damage, *inter alia*, to its industrial output. In the 1990s Turkey could not attain a similar pace of financing dozens of projects of different sizes that would further exploit its power generating potential. Turkish authorities argue that Turkey's hydropower and thermal energy sources are not sufficient to meet the steady increase in its energy requirements in the decades to come even if all are used up in power generation.

As of early 2012, the overall installed capacity reached 53 GWe. Of this capacity, 30.6 percent was from gas-fired plants, 32.2 percent from hydropower, 15.4 percent from local coal-fired plants, 7.9 percent from imported coal-fired plants and 2.6 percent from fuel oil-fire plants. The installed capacity from wind power plants was only 3.2 percent, while the

Arabia Acquire Nuclear Weapons?', *Issue Brief*, March 2004, James Martin Center for Nonproliferation Studies, , http://www.nti.org/e_research/e3_40a.html.

²⁹ Turkey's population is estimated to be 100 million in 2030 with a growth rate of 2.1 percent per year.

installed capacity from all other sources added up to 8.1 percent.³⁰ In terms of electricity production, the total capacity reached 262 TWh (hydro 53 TWh; thermal 307 TWh) with a net production of 194 TWh (hydro 36 TWh; thermal 156 TWh).³¹ Turkey's main domestic energy sources, namely fresh water and coal have potentials of 125 TWh/year and 105 TWh/y, respectively.³² These figures indicate that even if all of major domestic sources are somehow put into energy production, demand will again exceed domestic supply. Consequently, resorting to peaceful exploitation of nuclear power came to the fore again as a strategy for Turkey to diversify its primary sources of energy.³³

Therefore, assessing Turkey's nuclear aspirations also within the context of the states that have embarked upon large-scale nuclear power projects in response to Iran's advanced nuclear capability would be, at best, misleading. Because, half-a-century ago, long before many of the countries that are cited above have shown any tangible interest in nuclear technology, the first feasibility studies for a nuclear power plant were already launched by Turkey. However, neither that nor the subsequent attempts of the Turkish governments to benefit from peaceful exploitation of nuclear energy have come to fruition. Among a variety of reasons extending from a lack of well-defined national strategy in that area, to domestic political disturbances, the most significant has been the fear of Western countries of a re-transfer of nuclear material and technology that would be acquired by Turkey to third parties. In that regard, a Turkish-Pakistani connection was most feared by the United States. The result was reportedly the pressure of the United States on supplier countries and firms to deny transfers of nuclear reactors and related technology to Turkey.³⁴

First acquaintance with nuclear technology

The first nuclear research and training center of Turkey, namely the Cekmece Nuclear Research and Training Center (CNRTC) was established in 1961. That was followed by the installation of a 1 MWth pool-type research reactor TR-1 in CNRTC a year later.³⁵ Then, in 1966, Ankara Nuclear Research and Training Center (ANRTC) was established in the environs

³⁰ Necdet Pamir, *Meeting the New Challenges - A Social Democratic Approach to Turkey's Future Energy Policy*, Friedrich-Ebert-Stiftung Turkey Office, Istanbul, July 2012, pp. 5-7.

³¹ Average productivity of hydroelectric plants is 70 percent, while productivity of plants fueled with coal, oil and natural gas is 75 percent in the average. Gross electricity production was 8.6 TWh in 1970; 25 TWh in 1980; and 57 TWh in 1990. Source: State Hydraulic Works (DSI) of Turkey (http://www.dsi.gov.tr/faaliyet_raporlari/2009_faaliyet_raporu.pdf).

³² Lecture notes of Ozden Bilen, former Director of State Hydraulic Works of Turkey, Hydropolitics and Strategic Research and Development Centre, Hacettepe University, Ankara, Spring 1996.

³³ For a comprehensive discussion on this matter see Sinan Ulgen (ed.), *The Turkish Model for Transition to Nuclear Power*, Center for Economics and Foreign Policy Studies (edam), December 2011.

³⁴ Mustafa Kibaroglu, "Turkey's Quest for Peaceful Nuclear Power," *Nonproliferation Review*, Spring-Summer 1997, Vol. 4, No. 3, pp. 33-44.

³⁵ CNRTC was founded on a 3,200 acres area beside the Kucuk Cekmece Lake in the outskirts of Istanbul. Nuclear research and training are being carried out in its 10 departments. See the website of the Turkish Atomic Energy Authority (<http://www.taek.gov.tr>).

of the capital, as the second major branch of Turkish Atomic Energy Authority (TAEK), for carrying out “fundamental and applied research to use nuclear energy and technology for the benefit of the country and to support the national development.” With a view to exploiting natural uranium reserves of Turkey, the first feasibility studies for the construction of a 300-400 MWe pressurized heavy water reactor (PHWR) were launched in 1967 so as to start generating electricity by the year 1977. However, domestic economic and political developments halted that initiative.³⁶

Surveys for the selection of a nuclear site were conducted throughout Turkey. Due to its stable seismic conditions, Akkuyu Bay on the Mediterranean coast -about 43 km southwest of Silifke- was selected. Then, TAEK issued a license in 1976 for the site selected by Turkish Electricity Board (TEK). After the preparation of the necessary paperwork for bidding, with the assistance of a consortium of French and three Swiss firms, negotiations on the construction of a 600 MWe nuclear power plant, fuel services, and the financing of the investment were begun in 1977 with two half-state-owned Swedish firms, namely Asea-Atom and Stal-Laval which have made the best offer.³⁷ These negotiations would soon be interrupted by the military coup in Turkey in 1980.³⁸ In 1979 the 250 kWth Triga Mark II research reactor has started up operations and in 1981 the TR-1 research reactor, which was shut down in 1977, was replaced by a 5 MWth pool-type research reactor TR-2. In early 1980, a site selection survey for a second nuclear power plant had already started. Then, the northernmost point of Turkey in the central Black Sea region namely Inceburun, located some 25 km west to Sinop, was selected.

Allegations of illicit activities

The early 1980s also marked the beginning of allegations of illicit cooperation between Turkey and Pakistan. In 1981, the United States expressed concerns for a Turkish-Pakistani alliance on the grounds of alleged shipments from Turkey to Pakistan of strategic material with potential of nuclear weapons implications which would enable the latter go ahead with its quest for uranium enrichment technology. In the fall of 1983, in order to reinvigorate the interrupted efforts, seven major suppliers were invited to submit bids to install nuclear power plants in Turkey. Eventually, letters of intent for the supply of three power reactors in

³⁶ The intervention of the military in domestic politics, on March 12, 1971, with the so called *generals' memorandum* resulted in drastic changes in the government. Turkey was then administered for a couple of years by a series of short-lived ministerial cabinets.

³⁷ See Ahmet Kutukcuoglu, “Turkiye'nin Gecmisteki Nukleer Enerji Deneyimleri” (Past Experiences of Turkey in the Nuclear Field), *Uluslararası Nukleer Teknoloji Kurultayı* (International Nuclear Technology Forum), October 12-15, 1993, Ankara Makine Muhendisleri Odasi (Chamber of Mechanical Engineers), Ankara, Publication No: 168 (March 1994), pp. 40-44.

³⁸ The third of the so called *once-in-a-ten-year* intermissions in Turkish democracy took place on September 12, 1980 (previously on May 27, 1960 and March 12, 1971) as a result of the military coup of the then-Joint Chiefs of Staff. The democratic regime was reestablished with the country-wide elections held in November 1983.

two sites were issued to three firms, namely Atomic Energy of Canada, Ltd (AECL) for a 655 MWe CANDU reactor in Akkuyu; Kraftwerk Union (KWU) of Germany for a 990 MWe PWR in Akkuyu; and General Electric (GE) of the United States for one or two 1,185 MWe boiled water reactors (BWR) in Sinop.³⁹ Despite the fact that elaborate and high level talks in the nuclear field were held between Canada, Germany, and Argentina and Turkey no progress has been made throughout the 1980s.

Notwithstanding the concerns of Western nuclear supplier countries about Turkey's acquisition of nuclear power plants and thus advanced nuclear technology, Turkish experts went on to make estimates in the early 1990s for the scale of nuclear energy that would be needed for the decades to come. In early 1995, it was reported that construction tenders for a nuclear power plant at the Akkuyu site would be issued during the year. A contractor would be selected by 1998, with construction scheduled to begin in late 1998. AECL was expected to offer a 680 MWe CANDU-6 heavy water reactor, and Siemens of Germany was said to offer 1,400 MWe pressurized water reactor.⁴⁰ After long deliberations within the three-party coalition government, on July 25, 2000, then Prime Minister Bülent Ecevit declared that the tender for the nuclear power plants was cancelled due to the shortage of funds to construct the power plant.⁴¹

First nuclear reactor deal

Following the general elections in November 2002 that brought the Justice and Development Party (*Adalet ve Kalkınma Partisi - AK Parti*) to power to form a single-party government, the nuclear power issue was re-tabled as one of the major energy sources to reduce supply security risks caused by the dominance of imported fuels and to ensure diversity in power generation. In 2004, the Energy Ministry revived the nuclear project and launched studies for a long-term and comprehensive nuclear power program. Turkey and the United States agreed to cooperate on the civilian uses of nuclear energy, and the agreement was ratified by the Parliament on January 14, 2004.⁴² Following the proposal of TAEK for some eight possible locations as the nuclear power plant sites, in April 2006, Prime

³⁹ The total cost of these three units was estimated to be \$3.4 billion. See "The Chosen Three," *Nuclear Engineering International* (December 1983), p. 4.

⁴⁰ Mark Hibbs, "Turkey Expected to Request Bids for PWR Project in Coming Weeks," *Nucleonics Week*, March 21, 1996, pp. 1-2.

⁴¹ "Ecevit: Akkuyu ile İlgili İhalenin İptali Nükleer Enerjiden Vazgeçmek Anlamına Gelmiyor," *BYEGM*, July 26, 2000, <<http://www.byegm.gov.tr/YAYINLARIMIZ/HABERANADOLU/HABER-ANA/2000/07/HA00X07X26.HTM>>.

⁴² Türkiye Cumhuriyeti ile Amerika Birleşik Devletleri Arasında Nükleer Enerjinin Barışçıl Kullanımına İlişkin İşbirliği Anlaşması ve Eki Mutabakat Zaptının Onaylanmasının Uygun Bulduğuna Dair Kanun (The Law on the Approval of the Agreement between the Republic of Turkey and the United States on the Peaceful Use of Nuclear Power, and the Memorandum of Understanding) No. 5068, January 14, 2004, available at: <<http://www.tbmm.gov.tr/kanunlar/k5068.html>>.

Minister Erdogan announced that the government chose Sinop, Inceburun.⁴³ The Ministry stated that according to the plans, there would be a need for an installed 4,500 MWe nuclear energy by 2020. The Atomstroyexport-Inter Rao-Park Teknik consortium proposed to establish four units of VVER-1,200 (AES-2006) design reactors, which is the Russian type pressurized water reactor. The nominal electrical power of each unit proposed for Akkuyu would be around 1,200 MWe, and the total power of the nuclear power plant composed of four units would be approximately 4,800 MWe. The agreement that was signed with Russia is approved by the Turkish Parliament on July 15, 2010, which is also approved later on by the Russian Duma in October 2010 and finally signed by Russian President Medvedev in November 2010.

Turkish Perspectives about Iran's Nuclear Program

With the signing of the Russian deal for the construction of Turkey's first nuclear power plant, at a time when the possible implications of Iran's nuclear program for regional countries was debated in the scholarly circles as well as in the media, security analysts generally in the West have started to pronounce their concerns about Turkey's possible nuclear ambitions more frequently than ever. One major concern of Western countries regarding the nuclear program of Iran is whether it will incite other countries in the region to go down the same path and to proliferate.⁴⁴ Turkey is considered to be among those countries that are said to be likely to proliferate in case Iran's nuclear ambitions cannot be thwarted.⁴⁵

There are also views to the contrary, such as the one expressed by Steven Cook, a fellow at the Council on Foreign Relations in the United States, who argues that "even if the Turks wanted their own bomb, they have almost no capacity to develop nuclear weapons technology. Given the changes in Turkey's foreign policy and its drive for global influence, it is conceivable that it will want to develop a Turkish version of France's *force de frappe*. However, Ankara would literally be starting from scratch: Turkey has no fissile material, cannot mine or enrich uranium, and does not possess the technology to reprocess spent fuel, all of which are required for nuclear weapons development."⁴⁶ Cook also underscores that "this does not mean that Turkey is not interested in nuclear technology. Yet Ankara's efforts, to the extent that they exist beyond the two small-scale facilities in Ankara and

⁴³ "Nukleer Santralin Adresi Sinop (The Address of the Nuclear Plant is Sinop)," April 13, 2006, <http://www.ntvmsnbc.com/news/368946.asp>.

⁴⁴ Ari Shavit, "An Iran attack is the toughest question Israel faced since 1948," *Haaretz*, March 21, 2012. <http://www.haaretz.com/print-edition/opinion/an-iran-attack-is-the-toughest-question-israel-faced-since-1948-1.418747>.

⁴⁵ In private conversation on numerous occasions around the world the author was asked questions along these lines by authorities including scholars, experts, diplomats, military and civilian officers and the like.

⁴⁶ Steven A. Cook, "Don't Fear a Nuclear Arms Race in the Middle East", *Foreign Policy*, April 02, 2012. http://www.foreignpolicy.com/articles/2012/04/02/don_t_fear_a_nuclear_arms_race.

Kucukcekmece, are directly related to the country's predicted energy shortfall resulting from the combination of a booming economy and growing population. The Turkish government has announced plans for civilian nuclear power to provide a quarter of Turkey's electricity needs by 2040. But even this three-decade timeline seems overly optimistic given the inchoate nature of Turkey's nuclear research."⁴⁷

The above quotation from Steven Cook does indeed reflect largely the real situation with respect to the nature of Turkey's nuclear aspirations as well as the status of its past and current initiatives. Yet, it might still be useful to present how Turks see the nuclearization of the Middle East in general and Iran's nuclear program in particular.

Before going on with different viewpoints, it is necessary to emphasize that, even the disclosure of the Iraqi clandestine weapons of mass destruction programs in 1991 was not enough to prompt a substantial public debate in Turkey with respect to the nuclear, chemical and biological (NBC) weapons development capabilities of the neighbors and the threats emanating from their capabilities. This ought not to be the case for a country like Turkey, which sits in the immediate proximity of the Middle East -the most volatile region in the world and a region acknowledged as fertile soil for state aspirations to develop all sorts of weapons of mass destruction. But, today there is every reason for Turks to wonder and to discuss publicly whether their neighbors are attempting to develop mass destruction weapons, their delivery means having been acquired already, and what should be done against the threats posed thereof. Hence, the revelations about Iran's clandestine enrichment program in August 2002 have finally inflicted a debate in the public domain, not only with its military-strategic implications, but also with its political implications for Turkey's domestic and foreign policies.

Opinions in the public domain

From the public perspective, contrary to what one would expect, Iran's nuclear ambitions are not necessarily resented among the Turks for a number of reasons.⁴⁸ First, Iran's defiance of the US pressure to halt its enrichment program is considered to be a dignified stance of a small country against a global hegemonic power. Second, Islam is seen as a common denominator between the Turks and the Iranians, and the emergence of another Muslim nation with atomic power after Pakistan against the "Christian" and "Jewish" atomic bombs is generally seen a necessary equalizer. Third, and in relation to the second, due to anti-American and anti-Israeli sentiments, grown since the US invasion of Iraq and Israel's

⁴⁷ Ibid.,

⁴⁸ A quick scan of the Turkish media at any time interval can provide ample sources supporting this argument. Moreover, public opinion polls conducted by distinguished research centers such as the Pew Charitable Trusts also support the view that Iran is not considered by most Turks as an enemy of, or a threat to, Turkey. <http://pewglobal.org/reports/display.php?PageID=826>.

Gaza offensive as well as the flotilla incident on the high seas of the eastern Mediterranean, anything that is seen as hurting American or Israeli interests is usually welcome.⁴⁹

There are hundreds of Internet Web sites, blogs, and chat rooms in which Turks exchange their views on whether Iran's nuclear ambitions constitute a threat to Turkey or not, and whether Turkey should possess nuclear weapons or not. Regarding the degree of the perceived threat from Iran's nuclear aspirations, the majority of Turks do not believe that Iran, as a friendly Muslim nation, would want to threaten Turkey with its nuclear weapons, today or in the future, especially when Israel is considered Iran's prime target. On the issue of possessing nuclear weapons, the prevailing view among the Turkish population is one that supports having nuclear weapons for reasons similar to those expressed in the past by other countries, where nuclear weapons either were developed or at least have been attempted to be developed for some time.⁵⁰

Scholarly and bureaucratic elite view

Notwithstanding the above-mentioned sentiments that are quite pervasive in the Turkish public domain with regard to Iran's nuclear ambitions, also expressing their views are intellectuals, journalists, community leaders, and retired civil and military public servants who assess the negative implications of Iran's nuclear ambitions for Turkey's national interests.

According to Prof. Dr. Ümit Özdağ from Gazi University in Ankara, "Iran's acquisition of nuclear weapons would cause Iran gaining gravity in regional developments, in the Middle East, Central Asia and the Caucasus at the expense of Turkey. For example, a nuclear Iran will have more influence over Azerbaijan". To Özdağ, "Turkey will not accept living side by side with an Iran possessing nuclear weapons for a long period of time, and it will produce nuclear weapons to achieve the balance since it will be difficult to live with an Iran whose self-confidence has excessively mounted. Also, the ensuing shift in the power of conservatives in Iran will have adverse implications for Turkish-Iranian relations".⁵¹

⁴⁹ On May 31, 2010, Israeli commandos launched an operation aboard the Turkish civilian cruiser *Mavi Marmara*, which was heading toward Gaza with a view to delivering the humanitarian aid packages collected by a Turkish non-governmental organization, namely *İnsani Yardım Vakfı (IHH)*. Israel's operation claimed the lives of 9 Turkish citizens. Since then, Turkish-Israeli relations have hit the bottom and the embassies on each side remains closed as Turkey withdrew its ambassador in Tel Aviv and asked from Israel to do the same for its ambassador in Ankara.

⁵⁰ See in this respect, *Public Opinion Surveys of Turkish Foreign Policy 2012/1* by Center for Economics and Foreign Policy Studies (EDAM). <http://www.edam.org.tr/document/Edam2012Survey1.pdf>. Also see <http://www.zamansiz.com/turkiye-nukleer-silah-sahibi-olmali-mi>; <http://www.byturks.net/turkiye-nukleer-guc-sahibi-olmali-mi>; <http://www.hackhell.com/archive/>; <http://www.turkish-media.com/forum>; and <http://www.heavymetaltr.com>.

⁵¹ Umit Ozdag, "Iran Nukleer Silah Sahibi Olmali Mi? [Should Iran Possess Nuclear Weapons]," *Aksam*, March 7, 2005.

Dr. Şebnem Udum, a non-proliferation expert from Hacettepe University in Ankara suggests that “Turkey should have a military, diplomatic and political roadmap. In the worst case scenario, there is a great chance that Turkey would be a target. Turkey has the capacity to reciprocate, however, in order to deter a potential attack; Turkey should have active defense system as well as second strike capability.”⁵²

Soli Özel, an expert on Middle Eastern affairs from Kadir Has University in Istanbul argues that “Turkey has no interest in having a nuclear-armed Iran as its neighbor. It is cognizant that this would trigger a race to acquire nuclear weapons by Iran’s foes in the Arab world. Nuclear arms, plus increasingly sophisticated missile systems, would also tilt the balance of power between two neighbors of similar size in favor of Iran.” Özel also emphasizes that “Turkey has even less enthusiasm for war, waged by either Israel or the US. It believes a diplomatic solution to the nuclear standoff can still be found, if the Iranians are given a return ticket to the international system and a normalization of relations with the US.” According to Soli Özel, “Turkish authorities are increasingly worried about the fragmented nature of the Iranian regime and the growing clout of the Revolutionary Guard Corps.”⁵³

Cüneyt Ülsever, liberal columnist in the daily *Hürriyet*, points to Mahmoud Ahmadinejad’s coming to power and his declarations during the election process about his desire to develop nuclear power in Iran. According to Ülsever, “Turkey in its region and even in its border is facing a neighbor whose worldview is in complete contradiction with its worldview, which claims preponderance in the region, which has an ingrained and strong state tradition, which is adept in issues of intelligence, counter-espionage, and disinformation, which aims at possessing nuclear power and which now explicitly states its intention to advance in this direction”. According to Ülsever, “Turkey cannot consider the remarks of a regime that pursues imperial policies in its region and gives priority to ideological acrimony, that renounces the production of nuclear weapons as a guarantee since the existence of nuclear power is the threat itself and there is no guarantee that a country openly cooperating with terrorists will not deliver nuclear power to its accomplices when it is in trouble. May God be with Turkey in the Ahmadinejad era?”⁵⁴

Doğan Heper, a columnist in the daily *Milliyet* argues that, “following the end of the Cold War, the world has entered a process of turmoil or a process of restructuring. Even though, today, it is not possible to give a lucid answer to the question of how long this process will continue and what the shapes of the states will be, in order not to regret at the end of this process Turkey should take preventive measures, that is, it should be strong.” For Heper, the

⁵² Şebnem Udum, “Turkey’s Policy on Iranian Nuclear Issue”, *Ortadoğu Analiz*, Vol. 4, No. 43, July 2012. http://www.orsam.org.tr/tr/trUploads/Yazilar/Dosyalar/2012716_inceleme4.pdf.

⁵³ <http://www.bloomberg.com/news/2012-02-21/how-the-iran-nuclear-standoff-looks-from-turkey-commentary-by-soli-ozel.html>.

⁵⁴ Cüneyt Ülsever, “Dibimizdeki Nükleer Tehlike: Mahmud Ahmedinejad [Mahmoud Ahmadinejad: Nuclear Threat in Our Vicinity]”, *Hürriyet*, June 27, 2005.

first condition of being strong is “not to compromise the unity and the integrity of Turkey and to attach importance to nuclear research and development.” Heper states three main reasons to bolster the argument that it is essential for Turkey to develop nuclear weapons. First, possessing nuclear weapons is a means to protect the unity and the integrity of Turkey, and its standing in the region. Second, in addition to buoying its standing in the region, an army possessing such a capability would render Turkey an arbiter, a determining power in its region. Third, a success in the nuclear arena would boost the morale of Turkish people, which, in turn, would unite 75 million people, keep them within unity and integrity, and consolidate their pride of being a Turkish citizen. For Heper, Turkey’s elevation to the status of a nuclear power seems to be a somewhat inevitable outcome, because, he contends, “new conditions in the world are compelling Turkey to develop nuclear weapons”.⁵⁵

Kadri Gürsel, political analyst from *Milliyet* daily, asserts that “nuclear Iran might bring Turkey into a nuclear proliferation race. Such a move will not only bring tremendous political and economic burdens on our country, it will also significantly damage our relations within the region and with the international system. Becoming a part of US’s unreliable nuclear power umbrella will marginalize Turkey.”⁵⁶

In addition to these views on the civilian side, top ranking military officers, such as the former Commanders of the Turkish Air Force, Gen. Ret. Halis Burhan and Gen. Ret. Ergin Celasin argue that “if Iran develops nuclear weapons Turkey should do the same so as to be able to preserve the balance of power between the two countries and also in the region.”⁵⁷

Similarly, Prof. Dr. Colonel Taner Altınok, former Director of the Institute for Defense Studies of the Turkish Military Academy in Ankara argues, “Turkey should definitely follow the path that Iran walked over the years, both for energy generation purposes so as to meet Turkey’s growing demand for energy and also for attaining nuclear weapons capability to better protect Turkey’s national interests. Regional balances and conjectural developments compel Turkey to do so”.⁵⁸

Political elite perspective

Former Minister of State Vehbi Dinçerler, from the right-of-center and conservative Motherland Party (*Anavatan Partisi-ANAP*), takes the issue to yet another level, in connection with the possibility of Iran developing nuclear weapons capability, and argues

⁵⁵ Dogan Heper, “Türkiye ‘Atom’ Yapabilir [Turkey May Build Atomic Bomb],” *Milliyet*, January 26, 2006.

⁵⁶ Kadri Gürsel, “İran, İsrail, Türkiye ve nükleer tartışma [Iran, Israel, Turkey and the Nuclear Dispute],” April 18, 2010. <http://www.milliyet.com.tr/iran-israil-turkiye-ve-nukleer-tartisma/kadri-gursel/dunya/yazardetayarsiv/18.04.2010/1226530/default.htm>.

⁵⁷ Interviews with Gen. Burhan, Gen. Celasin, February 11, 2008, Ankara.

⁵⁸ Interview with Col. Altınok, March 10, 2008, Ankara.

that “Turkey should not only develop nuclear weapons, but the quantity as well as the quality of Turkey’s nuclear weapons arsenal should be at par with those of the other nations in the region”, pointing at the Israeli nuclear capability.⁵⁹

Similarly, former Minister of State Sadi Somuncuoğlu, from the right-of-center Nationalist Movement Party (*Milliyetçi Hareket Partisi*-MHP), argues that “taking into consideration the security situation in the world and the presence of nuclear weapons capable states in its region, Turkey should be ready to exploit nuclear technology for military purposes as well.”⁶⁰ Mr. Somuncuoğlu remembers that during his first term as a Minister in the Süleyman Demirel cabinet in 1977, he was harshly criticized especially by the Americans because of expressing his views publicly suggesting that Turkey should consider developing nuclear weapons.⁶¹

In the same vein, Haluk Özdalga, a Member of Parliament from the Justice and Development Party (*AK Parti*) in government, argues that “if the political regime in Iran were to change – even if it doesn’t change, if an unlikely Washington-Tehran consensus were to be reached, that would point the need for Turkey to develop nuclear weapons.”⁶²

The list of those who commented publicly on the subject is certainly not exhaustive, and their views or remarks are available in the open media sources. But, the ones presented above are believed to give an insight to the reader into the prevailing views in the Turkish society at various levels.

Official stance towards the Iranian nuclear program

Turkey’s official stance toward Iran’s nuclear program is, indeed, clear, and a number of statements to this effect have been made on various occasions by the top Turkish politicians all of whom underscored that Turkey recognizes the right of Iran, being a state party to the NPT, to develop nuclear technology, provided that it remains fully on a peaceful track and that Iran allows for the application of full-scope safeguards inspections by the IAEA in such a way that would lend the utmost confidence to the international community about its true intentions.

For instance, the Turkish Premier Recep Tayyip Erdoğan, speaking at the *World Economic Forum* held in Sharm El-Sheik, Egypt in May 2006, emphasized the facilitating role of political dialogue and political approaches to the settlement of the Iranian issue. Turkey, for Erdoğan,

⁵⁹ Interview with Mr. Dincerler, February 11, 2008, Ankara.

⁶⁰ Interview with Mr. Somuncuoğlu, October 27, 2010, Ankara.

⁶¹ Ibid.,

⁶² Haluk Ozdalga, “Nükleer Silah Türkiye için Bir Seçenek [Nuclear weapons is an option for Turkey]”, *Zaman*, January 22, 2012.

<http://www.zaman.com/haber.do?haberno=1233227&title=nukleer-silah-turkiye-icin-bir-secenek>.

“ought to take certain steps as a neighbor of Iran, but it is impossible for Turkey to approach the nuclear energy issue when it is perceived as weapons of mass destruction”.⁶³ On the same subject, in an interview with a Kuwaiti newspaper *El Anba* in March 2007, Erdoğan reiterated the diplomatic position of his government by saying, “states have the right to possess nuclear energy to utilize for peaceful purposes.” Erdoğan also emphasized that Turkey has good neighborly relations with Iran and that the two countries have developed mechanisms for the purpose of cooperation in security issues.⁶⁴ Yet, on another occasion, in response to a question posed by a journalist during the Munich Security Conference in February 2008 about “why Turkey did not seem to be worried about Iran’s nuclear program,” Prime Minister Erdoğan replied by saying, “our Iranian colleagues tell us that they want nuclear energy for peaceful purposes to satisfy their energy needs, not for weapons”.⁶⁵ Four years later, in March 2012, Erdoğan reiterated his views following his visit to Tehran, by saying that the Iranian religious leader Ayatollah Ali Khamaney “stated it clearly that there is no room for nuclear weapons in Sheria.” Erdoğan added “after having heard this statement, I can’t claim that Iran is developing nuclear weapons. The President Ahmadinejad also confirms the statement. So, don’t they have a right to develop a nuclear program for peaceful purposes?”⁶⁶

Similarly, President Abdullah Gül, during his address to the United Nations General Assembly in September 2010, said that “Iran should not consider developing nuclear weapons” and that “if Iran acquired nuclear weapons capability Turkey will be the country that will be most negatively affected from such a development.” On these days, Gül had also emphasized this point, during an interview with a journalist from *Christian Science Monitor*, by saying that “the West should not underestimate how seriously we take the issue of a nuclearized Iran; after all, we are neighbors and nuclear weapons would threaten us most of all.” More recently in May 2012, Gül has said that “Turkey is concerned about the possibility of nuclear proliferation and the spread of weapons of mass destruction in the Middle East” but he made it clear that “this principle extends not only to Iran but also to Israel.” Gül also warned that “attempts to develop or acquire such weapons may well trigger a regional race for their possession, which in turn would lead to further instability threatening international peace

⁶³ Adem Kadam, “Erdoğan: Biz de Nükleer Enerji İcin Calisma Yapmaktayiz [Erdoğan: We Too are Working for Nuclear Energy],” *Milliyet*, May 21, 2006.

<http://www.milliyet.com.tr/2006/05/21/son/sonsiy07.asp>.

⁶⁴ “Gül’den Sonra Erdoğan’dan da İran’a Guvence [Assurances to Iran from Erdogan after Gul],” *Milliyet*, March 12, 2007.

⁶⁵ Prime Minister Erdogan made these remarks during a press conference after he participated in the annual Munich Security Conference in Munich, Germany on February 09, 2008. The press conference was broadcast live on Turkish TV channels, such as *NTV* and *CNN Turk*.

⁶⁶ <http://wap.ntvmsnbc.com/Haber/Goster/25335202>.

and security. That is why we have always called for the establishment of a Weapons of Mass Destruction-Free Zone in the Middle East including both Iran and Israel.”⁶⁷

Turkey’s support for the efforts to create a nuclear weapons free zone in the Middle East has long been pronounced at almost all levels of the state. For instance, in an address to the Turkish War Colleges in Istanbul, the former Chief of Turkish General Staff Gen. Hilmi Özkök stated that, “doubts about Iranian efforts to influence the regimes of the surrounding states had disturbed Turkey and has been responsible for the low level of relations between Turkey and Iran”. After expressing that Turkey observed Iran’s nuclear efforts with concern like other states, Gen. Özkök said, “creation of a nuclear weapons free zone in the Middle East is Turkey’s policy”.⁶⁸

On the same account, Foreign Minister Ahmet Davutoğlu said in April 2012 that “Turkey is determined to contribute to promoting solutions to problems in the region, as it has in the past and will in the future. We prefer diplomacy and negotiations to be employed for finding solutions to conflicts. Our principle-oriented stance is clear: We want this region to be free of nuclear weapons and of any weapons of mass destruction.”⁶⁹

That said Turkish politicians’ support for the creation of a nuclear-weapon free zone in the Middle East may turn out to be a controversial issue from Turkey’s foreign policy perspective because of the presence of tactical nuclear weapons that are deployed in Turkey. This issue will be discussed later in the paper. At this stage, it suffices to say that in theory, the presence of US nuclear weapons on Turkish territory would not preclude Turkey from lending its support to a Middle East zone free of nuclear weapons. But, in practice, due to its ever more involvement in the politics of the Middle East, especially over the last decade, Turkey is seen by its southern neighbors as an integral part of the region. Thus, the US tactical nuclear weapons stationed on Turkish territory have become a subject of intense discussion among security experts both inside and outside of Turkey. Some political figures and security analysts from the Middle Eastern countries have said that if Turkish statements are to have any meaning at all, Turkey will have to consider its own contribution to the project by freeing its own territory from nuclear weapons that belong to the United States.⁷⁰

⁶⁷ *Today’s Zaman*, “Turkey warns of wider regional risks in Iran strike”, May 22, 2012. <http://www.todayszaman.com/news-281185-turkey-warns-of-wider-regional-risks-in-iran-strike.html>

⁶⁸ Nuray Basaran, “Özkök Pasa’dan Duyduğum İlk Mesajlar [First Messages that I Heard from General Özkök]”, *Aksam*, April 22, 2005. For more on the official position of the Turkish Armed Forces, see www.tsk.mil.tr.

⁶⁹ *Today’s Zaman*, “Foreign Minister Davutoglu says Turkey wants WMD-free Mideast”, April 10, 2012. <http://www.todayszaman.com/news-276976-foreign-minister-davutoglu-says-turkey-wants-wmd-free-mideast.html>.

⁷⁰ Amr Moussa, Secretary-General of the Arab League, expressed such an opinion to the author during the Global Zero Convention held in Paris on February 02, 2010. Similar views were expressed to the author by other experts from the region such as Dr. Mahmoud Vaezi, Director of the Center for Strategic Research in Tehran, back on December 25, 2004 during author’s research trip to Iran.

Institutional Liabilities Limiting Turkey's Possible Responses to the Nuclearization of the Middle East

Assertions are regularly made that Turkey could make the decision to obtain nuclear weapons in response to the nuclearization of the Middle East in general and a nuclear weapons capable Iran in particular. It is feared that Turkey might think about a path like Iran has followed. However, Turkey does not have a wide array of choices anyway, due to a number of limitations arising from its institutional liabilities, such as its adherence to the nonproliferation regimes, membership in the North Atlantic Treaty Organization (NATO), and its European Union vocation.

Turkey's treaty obligations under the WMD nonproliferation regimes

In the area of nuclear weapons, Turkey has become a state party to the NPT by signing it on January 29, 1969 and subsequently ratifying it on April 17, 1980. Turkey also concluded a "full-scope" Safeguards Agreement with the IAEA in 1982. Turkey assumed a full member status in the Conference on Disarmament (CD) in Geneva in 1997 after a long period of attending the meetings with an observer status. Eventually, Turkey joined the other international nuclear nonproliferation efforts such as the Zangger Committee and the Nuclear Suppliers Group (NSG) in 2000, signed and ratified the Comprehensive Nuclear Test Ban Treaty (CTBT) in 2001. Turkey also signed and ratified the Additional Protocol, which significantly enhanced the inspection and verification capability of the IAEA, in 2001.

In the chemical weapons domain, the Turkish Grand National Assembly ratified the Chemical Weapons Convention (CWC) on May 12, 1997. Seemingly, no serious debate has taken place prior to or during the voting except for that among a group of parliamentarians who suggested waiting to see the attitude of the United States with regard to the same issue on the grounds that Turkey's ratification should be "conditional" on the ratification of the Americans.⁷¹ Ratification of the CWC by the Turkish Parliament did not cause any difficulty in the military sphere either. The Turkish military has never contemplated building or deploying a chemical weapons arsenal, as there were, and still are, nuclear weapons deployed in Turkey as part of the NATO strategy.⁷² One may therefore conclude that one particular reason, among others, for the non-existence, let alone possession, of chemical weapons in Turkey is that this category of weapons were not assigned any role in NATO strategies. Banned chemicals in any of the categories that are expressed in the text of the CWC are not produced in Turkey. Or, if at all produced, none of these quantities reached the limits indicated in the Convention.

⁷¹ Their line of thought might have been based on the argument that in an international agreement where the United States takes no responsibility, Turkey's active involvement would not be necessary or imminent.

⁷² See in this respect the interview with the author by Saadet Oruc, "Debate Over US Nuclear Arms Storage Heats up," *Turkish Daily News*, pp. A1 & A2, October 23, 1999, Ankara.

Similarly, Turkey became a state party to the Biological Weapons Convention (BWC) of 1972 by ratifying it on November 5, 1974 without reservations. Turkey had also ratified the Geneva Protocol of 1925, which was the first international document that prohibited the production, stockpiling and use of bacteriological agents for weapons purposes. Turkey never had a biological weapons production program or a stockpile of biological weapons for reasons similar to chemical weapons. It is evident that the present international agreements to prevent the development and spread of biological weapons are far from meeting today's requirements. Besides the obvious dangers posed by the existence of biological and chemical weapons, the possibility of exploitation by terrorist organizations is considered to be a constant threat and concern for the international community. Therefore, Turkey gives its full support to the initiatives for strengthening the effectiveness of the Convention.

Assurances by NATO and the “extended (nuclear) deterrence”

A second factor that limits Turkey's options vis-à-vis a nuclear weapons-capable Iran is the assurances given by NATO to Turkey since its entry into the Alliance in 1952. Turkey is theoretically given “positive security guarantees” by the other members of NATO thanks to Article 5 of the North Atlantic Treaty signed in Washington D.C., in 1949. Accordingly, Turkey's entire territory would be eventually covered by a “nuclear umbrella” that would effectively deter possible attacks from other countries. At the crux of the “extended deterrence” capability of NATO are the US nuclear weapons that are deployed on allied countries in Europe including Turkey for 50 years.⁷³

The first decision to deploy US nuclear weapons in Turkey was made at the summit meeting of NATO held in Paris in December 1957. Though US intermediate-range nuclear Jupiter missiles were first placed near Izmir in 1961, they were withdrawn by 1963 as part of a secret agreement between President John F. Kennedy and Soviet leader Nikita Khrushchev to resolve the Cuban Missile Crisis.⁷⁴ This withdrawal did not, however, dramatically change the role that Turkey would play in the nuclear strategy of the United States or in NATO's contingency planning. The United States still sought to display NATO's solidarity with Turkey and to demonstrate the alliance's commitment to extended nuclear deterrence.⁷⁵ In the early 1960s, US nuclear weapons deliverable by US and Turkish military aircraft were deployed at air bases in Ankara, Eskisehir, Balikesir, and Malatya, and squadrons of jet

⁷³ Mustafa Kibaroglu, “The Future of Extended Deterrence: The Case of Turkey,” in Bruno Tertrais (ed.), *Perspectives on Extended Deterrence*, Coll. Research and Documents No: 03, Fondation pour la Recherche Stratégique, Paris, France, 2010, pp. 87-95.

⁷⁴ Nur Bilge Criss, “Strategic Nuclear Missiles in Turkey: The Jupiter Affair (1959–1963),” *Journal of Strategic Studies* Vol. 20 (1997), pp. 97–122.

⁷⁵ Mustafa Kibaroglu, “Turkey and Shared Responsibilities,” in Scott Sagan, ed., *Shared Responsibilities for Nuclear Disarmament* (Cambridge, MA: American Academy of Arts and Sciences, 2010), p. 25.

fighters were assigned to nuclear strike missions as part of NATO contingency plans.⁷⁶ In addition, the Incirlik Air Base near Adana on the eastern Mediterranean coast was allocated to the United States for the stationing of nuclear-capable US bomber aircraft.⁷⁷

There were two main reasons for Turkey to host US nuclear weapons. First and foremost was their deterrent value against the nuclear and conventional capabilities of the Soviet Union.⁷⁸ A second reason was NATO's "burden-sharing" principle: since the benefits of collective security are shared by all, the risks and burdens of the alliance should also be shared. Turkey has subscribed to this principle since it joined NATO in 1952. In fact, Turkey had already displayed its willingness to share the burden of defending the interests of the Western alliance by committing a significant number of troops to the Korean War in 1950, before NATO membership.⁷⁹

Turkey continues to host US tactical nuclear weapons on its territory, albeit in much smaller numbers and at only one location, namely the Incirlik Base.⁸⁰ All other nuclear weapons have been withdrawn.⁸¹ Even after the collapse of the Soviet Union, Turkish military commanders believed US nuclear weapons constituted a credible deterrent against rivals in the Middle East, such as Iran, Iraq, and Syria, all of which had unconventional weapons capabilities and delivery vehicles such as ballistic missiles.⁸² Although the threats facing Turkey have changed with the turn of the century, Turkish officials continue to view the tactical nuclear weapons as important to the country's security interests and to Turkey's role in the NATO alliance.⁸³

According to Turkish government officials, nuclear weapons continue to preserve their critical importance for the security of the North Atlantic Alliance, yet they are regarded more as political weapons. They underline the fact that Turkey is committed to the vision of a world free of nuclear weapons, and thus supports every effort in that direction. This issue becomes even more important when considered under the light of the developments taking place in our nearby geography. Nevertheless, Turkish officials stress that it must be acknowledged that attaining such a goal will not be possible any time soon, and that more

⁷⁶ General Ergin Celasin (ret.), former commander of the Turkish Air Force (1999–2001), recalls flying with these jet fighters in the early 1960s when he was at the rank of lieutenant. Author's interview with General Celasin, February 15, 2010, Ankara.

⁷⁷ Mustafa Kibaroglu, "Acceptance and Anxiety: Turkey (Mostly) Embraces Obama's Nuclear Posture," *Nonproliferation Review*, March 2011, Vol. 18, No. 1, pp. 201-217.

⁷⁸ Mustafa Kibaroglu, "Reassessing the Role of U.S. Nuclear Weapons in Turkey," *Arms Control Today*, June 2010, p. 11, <www.armscontrol.org/act/2010_06/Kibaroglu>.

⁷⁹ Kibaroglu, "Reassessing the Role of U.S. Nuclear Weapons in Turkey," p. 11.

⁸⁰ Hans M. Kristensen, *US Nuclear Weapons in Europe: A Review of Post-Cold War Policy, Force Levels, and War Planning* (Washington, DC: Natural Resources Defense Council, 2005), p. 9.

⁸¹ Mustafa Kibaroglu, "Isn't It Time to Say Farewell to US Nukes in Turkey?" *European Security*, Vol. 14, No. 4 (December 2005), pp. 443-457.

⁸² Kibaroglu, "Reassessing the Role of U.S. Nuclear Weapons in Turkey," p. 11.

⁸³ Mustafa Kibaroglu, "Acceptance and Anxiety: Turkey (Mostly) Embraces Obama's Nuclear Posture," *Nonproliferation Review* (March 2011), Vol. 18, No. 1, pp. 201-217.

time and patience will be needed to realize this objective. Hence, so long as these weapons do still exist in other parts of the world, they argue, it is indispensable for NATO to preserve a safe, secure, and effective nuclear arsenal that will be capable of deterring all sorts of enemies in order to ensure the security of all of its allies.⁸⁴

Since the US nuclear weapons stationed in Turkish territory constitute one of the most strategic aspects of Turkey's national security strategy, every Turkish government has calibrated its position vis-à-vis this particular issue along the lines of the long-established state policy in this respect. Most government officials believe that this state policy should not be subject to fluctuations based on short term political goals or hasty decisions.⁸⁵ Hence, the current Justice and Development Party (*AK Parti*) government pursued pretty much the same policy with respect to the status of US nuclear weapons deployed in Turkey, and assigned an equal significance to the role that they are seen as playing for the security of the country.

On the other hand, Turkey's decision to host the essential parts (i.e., the radar site)⁸⁶ of the NATO-wide air defense system, also known as the "Missile Shield", added another dimension to the issue of assurances provided to Turkey by the Alliance against the threat of proliferation of weapons of mass destruction and their delivery vehicles in its region.⁸⁷ The essential question here, in connection with Turkey's decision to take an active part in the project, is whether the deployment of an advanced missile defense capability would positively affect the perception of the Turkish security elite vis-à-vis the threat posed by the nuclear and missile capabilities of neighboring Iran in particular, and the nuclearization of the Middle East in general. In other words, would the Missile Shield significantly limit Turkey's potential aspirations towards going nuclear in response to Iran's development of nuclear weapons capability in the first place?

⁸⁴ Written notes (whose sources cannot be disclosed) on the "U.S. Nuclear Posture Review Report" (originals in Turkish) given to the author, upon his request, by officials from various branches of the government, July 2010, Ankara.

⁸⁵ Author's interviews with government officials, including advisors of top executives, during the months of June and July 2010.

⁸⁶ The radar site of the Missile Shield is built radar site in the Kurecik village in the environs of the city of Malatya in eastern Turkey, and became operational as a NATO asset in in May 2012 at the time of the Chicago Summit meeting of the Alliance.

⁸⁷ The Missile Shield was developed by the United States as the part of the "National Missile Defense" project that was launched by the Clinton administration in the 1990s, which, in turn, had its roots in the "Strategic Defense Initiative" or the so-called "Star Wars" project of the Reagan administration of the 1980s. After a series of achievements and breakthroughs in the development phase in the second half of the 1990s, the United States eventually decided to share its elaborate capabilities with the allied countries for the protection of the military assets as well as the entire territories of all NATO members. A formal decision in that direction was taken at the Prague Summit of the Alliance in November 2002 and the project was expanded both in scope and content ever since with the contribution of the allies.

An answer to these questions partly lies in the stance of the Turkish government authorities prior to and during the Lisbon Summit meeting of NATO in November 2010 where the ultimate decision about the development and deployment of the Missile Shield project would be taken. In the run up to the Lisbon Summit, international media coverage of the NATO meeting of foreign and defense ministers held in Brussels on October 14, 2010 created an image as if Turkey and other NATO members were having a row over the development of a ballistic missile defense project for the alliance, which was not exactly the case.⁸⁸ It is true that Turkey and the leading members of the alliance did not see eye to eye on every single aspect of the missile defense project of NATO; however, the degree of divergence of opinion was not as wide as it was seen from a distance.⁸⁹

Turkish authorities had mainly three concerns. First, Turkish governments have always wanted to see the project be a NATO project, rather than a US one. This principle was also endorsed by the AK Parti government during the deliberations in Lisbon in 2010. Because, based on the lessons learned, Turkey did not want a repeat of the post-Cuban Missile Crisis removal of the Jupiter missiles where the United States had essentially unilateral control. Moreover, Turks had doubts about whether the US system would be aimed at protecting Turkey, or whether Israel's security would be its true concern. Second, Turkish authorities did not want any country named as the source of the threat against which the alliance would be developing the project, an issue that the AK Parti government was most sensitive.⁹⁰ Turkey's unwillingness to specifically name a state (read Iran) had indeed two motives: one was the reluctance to identify a neighboring country as a target with which the AK Parti government had developed quite friendly relations over the last several years, which was unprecedented in the history of Turkish-Iranian relations.⁹¹ The other was the concern that the Turkish authorities had about the Iranian leadership who could exploit this to justify advancement of their own missile and military capabilities for defense purposes to the greater Islamic world and also elsewhere. Therefore, Turkey's opposition to naming a country was a calculated decision designed to halt Iran's growing missile capabilities. This point seemed to be overlooked by many amid unfounded concerns that Turkey's loyalties are drifting away from the West and closer to Iran. A third concern was that every single square inch of the Turkish territory must be covered by the missile defense system once it becomes operational.⁹²

⁸⁸ <http://www.washingtonpost.com/wp-dyn/content/article/2010/10/14/AR2010101405260.html>.

⁸⁹ Mustafa Kibaroglu, "Acceptance and Anxiety: Turkey (Mostly) Embraces Obama's Nuclear Posture," *Nonproliferation Review* (March 2011), Vol. 18, No. 1, pp. 201-217.

⁹⁰ Tulay Karadeniz, "Turkey Says Anti-Missile Should Not Single out Iran," Reuters, October 18, 2010, <www.reuters.com/article/idUSTRE69H3BX20101018>.

⁹¹ Mustafa Kibaroglu, "Turkish-Iranian Relations Under the AKP Government," in Bill Park (ed.), *The AKP and Turkey as a Regional Power*, Stanford University Press, Stanford: CA (forthcoming);

⁹² Views expressed by a high-level Turkish diplomat during an international workshop in Ankara, October 4, 2010 quoted in Mustafa Kibaroglu, *Acceptance and Anxiety: Turkey (Mostly) Embraces Obama's Nuclear Posture*,

A reading of Turkey's major concerns with regard to the issue of deployment of the Missile Shield suggests that Turkish authorities do indeed consider the presence of NATO's sophisticated defensive capabilities as highly valuable strategic assets for Turkey's protection against the actual and also potential threats emanating from the proliferation of weapons of mass destruction and their delivery vehicles that are already (and likely to be in the future) in the arsenals of its neighbors, especially in the Middle East. Hence, it wouldn't be wrong to argue that Turkey will feel more secure with the presence of NATO's defensive assets deployed on its territory that will enhance the extended deterrence provided to Turkey by the Alliance. As a consequence of this, it would be logical to think that Turkey's potential aspirations toward developing its own nuclear deterrent as an insurance policy against a nuclear Iran would be significantly diminished.

European Union vocation

A third factor that limits the options available to Turkish decision-makers in case Iran has weaponized its nuclear infrastructure is Turkey's candidate status before the European Union (EU). As such, if developed, Turkey's nuclear program would be under the scrutiny of the relevant institutions of the EU throughout the accession negotiations. If and when the accession process is successfully completed, Turkey will have to become a state party to the EURATOM Treaty, as a condition of full membership, which would permit only peaceful applications of nuclear technology.

Limitations of the Institutional Liabilities

While all three powerful limiting factors mentioned above suggest that it is highly unlikely for Turkey to follow the path of Iran by developing a dubious nuclear infrastructure that may have weapons implications in the future, the changing circumstances both inside and outside of Turkey and the state of affairs in the relations of Turkey with the above-mentioned institutions that are presented as insurance policies against Turkey's potential inclination toward "going nuclear", may not remain on the same track in the longer term.

Shortcomings of the nuclear non-proliferation regime

In the area of nuclear non-proliferation regime, a series of developments that have taken place in the world over the last decade have cast doubts on the future prospects of the regime. These developments include North Korea's nuclear detonation; revelations about Iran's secret facilities suitable for fissile material production; the US-India nuclear deal; failure to get the ratification of IAEA's Additional Protocol from all of the states of concern, including Iran; failure to urge the enforcement of the CTBT; and failure to start negotiations for a fissile material cut-off treaty. This list can be expanded. Added to these has been the unequal and unacceptable treatment of Turkey by the major suppliers of nuclear technology

in the West, such as the United States, Germany, and Canada, in its previous attempts, resulting in the failure to install nuclear power plants in the country.⁹³ Such a situation caused loss of confidence among the Turks in the value of the “bargain” that was inherent in the NPT, which suggests that, in return for denouncing nuclear weapons, member states would benefit from nuclear technology transfer from other countries and/or develop indigenously, as much as they needed, under international safeguards.⁹⁴

Failures in NATO’s commitment to Turkey

With regard to the assurances provided by NATO membership, the Alliance has indeed failed the first immediate test of solidarity when Turkey called upon NATO in 1991 to deploy the Rapid Reaction Force on Turkish territory against the threat posed by Iraq following its invasion of Kuwait in August 1990. Especially the Western European members of NATO have dragged their feet in living up to their Article 5 commitments, arguing that the Middle East was “out of the area” of NATO’s operation zone.⁹⁵ A similar situation arose in 2003, when Turkey formally asked the North Atlantic Council to activate Article 4 of the Washington Treaty with a view to starting deliberations on the possible measures that each member nation would have to take in the run up to the second Gulf War, in order to protect Turkey against Iraq’s much propagated missiles and weapons of mass destruction. NATO members once again failed to honor their Treaty obligations toward Turkey. Only in response to Syria’s hostile act on June 22, 2012 by downing a Turkish jet in the eastern Mediterranean the NATO Council, which met upon Turkey’s request, issued a statement that underscored solidarity of the allied nations with Turkey against the Assad regime in Syria.⁹⁶ Yet, the powerful image of NATO in the eyes of most Turks has been diluted due to the process of the transformation of the Alliance from a collective defense organization, with a “hard power” stance, to a collective security organization, with a perceived “soft power” attitude. No less important is the effect of anti-American sentiments in the Turkish public domain in undermining the significance of NATO, which is starting to be seen as an organization that “serves primarily the interests of the United States and helping it to establish its world hegemony.”⁹⁷ This can best be seen in the harsh criticisms leveled against the “Missile

⁹³ Mustafa Kibaroglu, *Turkey's Quest for Peaceful Nuclear Power*,

⁹⁴ Mustafa Kibaroglu, “Iran’s Nuclear Program May Trigger the Young Turks to Think Nuclear”, Carnegie Endowment for International Peace, available on www.ceip.org.

⁹⁵ Mustafa Kibaroglu, “The Generals’ Discontent,” *The Bulletin of the Atomic Scientists*, March/April 2001, Vol. 57, No. 2, pp. 28–30;

⁹⁶ “Doorstep statement delivered by the NATO Secretary General, Anders Fogh Rasmussen following the meeting of the North Atlantic Council”, June 26, 2012.

http://www.nato.intcps/en/natolive/opinions_88662.htm?selectedLocale=en.

⁹⁷ Nearly 80 percent of Turkish people think that Turkey and the United States are not allies anymore. The findings of one such poll can be found at <http://www.transatlantictrends.org>.

Shield” project of the Alliance that required deployment of a radar site in the Kurecik village in the environs of Malatya in eastern Turkey.⁹⁸

Unequal treatment by the European Union

Turkey has been striving to be a part of the European integration process for half-a-century. Turkey and the European Economic Community (EEC) signed the Ankara Treaty in 1963, which, in theory, gave Turkey a full membership perspective. However, only after a long period of ups and downs in the relations, did Turkey manage to get a date in 2004 to start formal accession negotiations with the EU, yet with conditions attached. Despite the fact that the start of accession talks has institutionally brought Turkey closer to the EU, the optimistic mood among the Turks and the Europeans soon took a negative turn. Suspicions of Turkey’s suitability for membership have grown ever since.⁹⁹ European public opinion has been growing wary of the presence of the Muslim community in the EU. If the question of Turkey’s eventual accession were put to public referenda, overwhelming majorities in countries like Austria and France would likely cast negative votes.¹⁰⁰ Objections to Turkey’s membership on the basis of identity-related considerations have increased, while the arguments in favor of Turkish accession on the basis of cost-benefit calculations have lost ground. With the rise of *Islamophobic* sentiments across the European continent in the aftermath of the September 11 attacks, coupled with growing societal security concerns over the existence of approximately 20 million Muslims, the EU has increasingly become reluctant to develop a strong geopolitical commitment to Turkey’s eventual accession.¹⁰¹ Worst of all, accession negotiations were suspended on eight of some 35 chapters, each of which must be successfully completed for full membership, only a year after the start of the process, because of Turkey’s resistance to the European requests to open its naval and air ports to Greek Cypriot naval vessels and airplanes. Against this background, it would not be unfounded to argue that prospects for Turkey’s accession talks to be completed at an early date are not promising and they are likely to take a long time, due to structural problems in the relations between Turkey and European Union.¹⁰²

⁹⁸ Mustafa Kibaroglu, “NATO’nun Balistik Fuze Savunma Sistemi ve Turkiye” (NATO’s Ballistic Missile Defence and Turkey), *Uluslararası İlişkiler Dergisi (Journal of International Relations)*, NATO Özel Sayısı (Special Issue on NATO), Summer 2012, Vol. 9, No. 34, pp. 183-204.

⁹⁹ Tarik Oguzlu & Mustafa Kibaroglu, “Is the Westernization Process Losing Pace in Turkey: Who’s to Blame?” *Turkish Studies*, December 2009, Vol. 10, No. 4, pp. 577-593.

¹⁰⁰ Antonio M. Ruiz-Jimenez, “European Public Opinion and Turkey’s Accession: Making Sense of Arguments For and Against”, *European Policy Institute Network*, 2007, Working Paper No. 16.

¹⁰¹ Lauren M. McLaren, “Explaining Opposition to Turkish Membership of the EU”, *European Union Politics*, 2007, Vol. 8, No. 2, pp. 251-278.

¹⁰² Tarik Oguzlu and Mustafa Kibaroglu, “Incompatibilities in Turkish and European Security Cultures Diminish Turkey’s Prospects for EU Membership,” *Middle Eastern Studies*, November 2008, Vol. 44, No. 6, pp. 945-962.

Topical Questions Regarding Turkey's Nuclear Future

Considering the above-mentioned factors that limit Turkey's institutional liabilities, mainly two burning questions tackle the minds of most security analysts and policy-makers in the West. The first one is: "would Turkey make the decision to obtain nuclear weapons in response to a nuclear Iran and NATO tactical nuclear weapons being withdrawn?" The second question is: "under what circumstances could Turkey reevaluate its commitments under the NPT and consider treaty withdrawal to pursue nuclear weapons?"

In connection with the first question whether Turkey would like to follow its own independent nuclear weapons program should American tactical nuclear weapons are withdrawn, one must bear in mind the following three points. First of all, almost everybody in the international security realm admits that the tactical nuclear weapons deployed in European countries including the ones in Turkey have no significant military value as there is no feasible scenario within which these weapons could be used. Second, the "extended deterrence" provided by the nuclear strategy of NATO to its members may be achieved by other means such as, temporary deployment of US nuclear submarines in the eastern Mediterranean and also by way of port visits to allied countries like Turkey whereby a powerful message may be delivered toward the unfriendly countries.¹⁰³ After all, out of the 28 members of NATO, there are no nuclear weapons deployed on 20 of them who equally benefit from NATO's deterrent as they are covered by the "nuclear umbrella" of the Alliance.¹⁰⁴ Third, the Turkish Air Force does no longer have a role in the nuclear strike missions of the Alliance¹⁰⁵. During the Cold War period and in its immediate aftermath, Turkish Air Force participated in NATO's nuclear strike exercises known as "Steadfast Noon," during which crews are trained in loading, unloading, and employing B61 tactical nuclear weapons.¹⁰⁶ Over the last several years, however, Turkish military aircraft participate in these exercises as non-nuclear air defense escort units rather than a nuclear strike force.¹⁰⁷ It can be seen from the above discussion that the US nuclear weapons that have long been stationed on Turkish territory have now only a symbolic value, and thus their possible withdrawal alone is not likely to prompt Turkey to embark upon a crash nuclear program and to get involved in a nuclear adventure.

¹⁰³ Mustafa Kibaroglu, "Turkey and Shared Responsibilities", in Scott Sagan (ed.), *Shared Responsibilities for Nuclear Disarmament*, American Academy of Arts & Sciences, Cambridge, Massachusetts, 2010, pp. 24-27.

¹⁰⁴ Three of the 28 NATO members, namely the United States, the United Kingdom and France are Nuclear-Weapons States under the NPT and possess their own nuclear weapons. Five other members namely, Belgium, Germany, Italy, Netherlands and Turkey host nuclear weapons that belong to the United States. There are no nuclear weapons stationed in any of the remaining 20 members of the Alliance.

¹⁰⁵ Author's interview with General Celasin, February 15, 2010, Ankara.

¹⁰⁶ Hans M. Kristensen, e-mail communication with author, April 22, 2010.

¹⁰⁷ Ret. General Ergin Celasin, e-mail communication with author, April 23, 2010.

In connection with the second question whether Turkey would reevaluate its commitments under the NPT and consider treaty withdrawal to go nuclear, or pursue a hedging strategy through the acquisition of dual-use nuclear technology while remaining in the NPT as a non-nuclear weapon state, it must be noted that the fundamental thrust of Turkish foreign and security policy has been to become a state party to international arms control and disarmament agreements, wherever appropriate, so as to contribute to their effective implementation. Moreover, Turkey endorsed efforts to strengthen the nuclear non-proliferation regime and the verification mechanism of the IAEA. Therefore, Turkey paid much attention in the 1990s to the proceedings of a study called “Programme 93+2” as an attempt to make IAEA safeguards inspections more intrusive, which have culminated in the “Additional Protocol” in 1998. Since then has been taking the necessary steps to become more active both in the initiation and the development process of tightening export control regimes and also enabling the IAEA to have wider inspector access to nuclear-related facilities (declared or undeclared), especially in the suspect countries. Turkish policy-makers have confidence in the utility and effectiveness of export control regimes and arrangements to curb weapons proliferation as they have credible information to the effect that many proliferators were frustrated by the export controls, which aim at preventing the spread and accumulation of destabilizing conventional weapons by controlling their transfers and also by imposing export control measures on sensitive and dual-use equipment and technologies needed for the production of weapons of mass destruction.

No country, which would have ambitions to pursue a clandestine nuclear weapons program, would have committed itself to so many binding agreements whose violations would by no means be detected by the international community without much difficulty. Treaty withdrawal, on the other hand, would be much less probable, after so much commitment to the principles and the norms of the nuclear non-proliferation regime.

Does Turkey need to be reassured that it does not need to develop nuclear weapons?

With or without the incitement of Iran’s nuclear program, Turkey may theoretically be seen as a powerful candidate to seek nuclear weapons development capability. But a host of reasons militate against such an option. Before everything else, it must be noted that virtually no state has developed nuclear weapons capability without substantial support and effective cover from a superpower or from a scientifically and technologically advanced country. The United Kingdom and France received various degrees of political, scientific and technological support from the United States at various stages of their nuclear weapons programs. Israel received support from particularly France and Norway in the 1950s and 60s to overcome some of the scientific and technological barriers, such as the heavy water needed for the operation of the Dimona reactor, which is central to its “opaque” nuclear capacity.¹⁰⁸ Similarly, South Africa benefited from its nuclear ties with foreign countries,

¹⁰⁸ Avner Cohen, *Israel and the Bomb* (New York: Columbia University Press, 1998), p. 32.

particularly Israel in building its nuclear weapons.¹⁰⁹ On the other hand, Pakistan gained technology from many sources. This extensive assistance is reported to have included, among other things, uranium enrichment technology from Europe, blueprints for a small nuclear weapon from China, and missile technology from China.¹¹⁰ The Indian nuclear weapons program might not have been possible without the technology and material provided by Canada and the United States.¹¹¹ China received partial support from the Soviet Union when the conjuncture was permissive and China in turn provided support to the Pakistani and North Korean nuclear programs. In the case of Iran, the role of China and Russia cannot be overlooked.

Hence, one particular condition for Turkey to go nuclear, either clandestinely by staying in the NPT, or by walking out of the treaty, would be to secure the endorsement of such a power, which, however, is not on sight nowadays. Short of such a supporting power, the only possible way of meeting the scientific and technological requirements would be through an illegal network similar to that of Abdel Qadeer Khan, the “father of Pakistani bomb,” now under house arrest in Pakistan. The magnitude and the scope of illegal acquisition would be extremely difficult, if not impossible, in a country like Turkey, where there are relatively small but highly effective groups of concerned people who would do their best to reveal such critical information to the world. Should such a development take place, Turkey would be treated like a “rogue state,” something unthinkable and unacceptable, given the past record of Turkey in its non-proliferation efforts mentioned above.

Notwithstanding these difficulties, even if one considers for a moment that Turkey has decided to go nuclear and has managed to get the support of a nuclear power, or that it has established a clandestine nuclear weapons procurement network and gotten away with it without being noticed, what would be the role of nuclear weapons in Turkey’s security and foreign policies? Would nuclear weapons enhance Turkey’s security? Or, would they simply hurt Turkey’s interests?

This author has spent years studying military history, superpower rivalry, arms control, disarmament, and non-proliferation matters. Even when looked at from these rich perspectives, the author sees no feasible scenarios under which nuclear weapons would bring additional security to Turkey. On the contrary, any attempt to illegally pursue, let alone acquire, nuclear weapons capability would be extremely damaging to Turkey’s vital interests. Turkey is passing through a difficult domestic and international political conjuncture where

¹⁰⁹ Jeffery Richelson (ed.), *U.S. Intelligence and the South African Bomb*, The National Security Archive, 13 March 2006, available at <http://www.gwu.edu/~nsarchiv/NSAEBB/NSAEBB181/index.htm>.

¹¹⁰ Paul Kerr and Mary Beth Nikitin, *Pakistan’s Nuclear Weapons: Proliferation and Security Issues*, Congressional Research Services, January 14, 2008, p. 2.

¹¹¹ George Perkovich, *India’s Nuclear Bomb: Impact on Global Proliferation* (Berkeley, CA.: University of California Press, 1999).

there are many sensitive issues (social, economic, political) that may be carefully exploited by its rivals.

Against all these odds, even if one considers for a moment that Turkey has acquired nuclear weapons capability, then under which scenarios and against whom would these weapons have added value in Turkey's foreign and security policies? It is hard to give a meaningful answer to this question. Out of Turkey's neighbors, Iraq has been under US occupation. Even after withdrawal of the remaining American and British troops from Iraq in 2011, their commitment to the security of that country will most likely remain the same. Syria has proved that, even with its ballistic missiles and chemical weapons arsenal, it could not resist Turkey's coercion in 1998 that was aimed to expel the head of PKK, Abdullah Öcalan, from that country. Currently, the Assad regime is deeply immersed in an internal conflict and the future of the regime is bleak. Even if Iran's nuclear weapons capability disrupted the balanced relations with Turkey, this alone may not be a justification for going nuclear and for going through all possible ways of hardship to get there. A nuclear-weapons capable Iran will most likely be an issue that will have to be dealt with collectively with the rest of the international community, the United States and Israel being at the forefront. Greece and Armenia are other potential countries with which Turkey had, and may have, problems in its foreign relations. However, the EU membership of Greece and the powerful Armenian Diasporas in the United States and Europe will most likely nullify the nuisance capability of Turkey's nuclear power against these countries. In addition, Turkey has good neighborly relations with the rest of the countries in its environs, such as Bulgaria, Romania (now NATO allies), Ukraine, Georgia, and Russia (which still keeps a large nuclear arsenal).

As such, there seems to be no possible feasible scenario whereby Turkey could expect to effectively use its nuclear power status, if and when achieved. However, there are scenarios in which Turkey's vital interests can be seriously damaged simply because it will have attempted to acquire nuclear weapons capability. Even though there is talk in Turkey about why Turkey should develop nuclear weapons among those who approach the issue from the perspective of national pride and prestige as well as security, most of the Turkish ruling civil and military elite who are currently in power as well as those who are likely to govern the country in the foreseeable future are quite aware that the possible consequences of going nuclear would mean violation of Turkey's international obligations. The degree of awareness is not only an outcome of reminders by outside powers pointing at the difficulties Turkey may have to endure, but also the state practice in Turkey's notable institutions, such as the Ministry of Foreign Affairs and the General Staff. Hence, it wouldn't be an oversimplification to argue that Turkey does not need to be re-assured that it does not need to develop nuclear weapons, provided that the existing assurances in alliance relations are properly observed.

Conclusion

Against this backdrop, one should not expect Turkey to embark upon a nuclear weapons program, even if Iran crosses the critical threshold of nuclear weapons development capability. Should this happen, however, what will keep Turkey away from nuclear weapons will not simply be its responsible state practice. The extent of the willingness and the ability of Turkey's friends and allies to mitigate its fears that emanate from the worsening security situation in the region will also have a decisive effect on Turkish policy makers. Improving relations with the United States and the European Union as well as strengthening the nuclear non-proliferation regime will make the greatest impact in this regard. If, in addition to improved relations between Turkey and the United States as well as the EU, the nuclear nonproliferation regime can be further strengthened, Turkey's acquisition of nuclear technology will not necessarily become a case for serious concern, because Turkey will be under the scrutiny of the international community through the effective implementation of the IAEA safeguards according to the Additional Protocol as state party to the NPT.

It is unfortunate that a debate has taken place in Turkey for the last several years around this subject, but not necessarily with the contribution of informed and educated views from the experts in the field. Most of the debate is rather emotional, reactive to daily events, and also partly ideological. These reactions, however, must be avoided in order to preserve Turkey's political unity and territorial integrity for as long as possible and also to serve the primary interests of the Turkish nation. For this to happen, first of all, the factors that trigger such a debate must be eliminated, including, among others, the possibility of Iran's nuclear weapons development. Secondly, intellectuals, community leaders, and concerned citizens must get involved in the debate in order to enlighten the public as well as the decision-makers. Third, Turkey must invest in such scientific and technological areas that will seize the future and will help advance the quality of life in the country and in the rest of the world.