

The Perception Gap Over Nuclear Proliferation in the Middle East

Written by Shawn McFall

This PDF is auto-generated for reference only. As such, it may contain some conversion errors and/or missing information. For all formal use please refer to the official version on the website, as linked below.

The Perception Gap Over Nuclear Proliferation in the Middle East

<https://www.e-ir.info/2017/07/13/the-perception-gap-over-nuclear-proliferation-in-the-middle-east/>

SHAWN MCFALL, JUL 13 2017

Nuclear energy is enjoying a resurgence in popularity, causing untapped markets in the Middle East to become bidding grounds for foreign businesses in the nuclear energy sector. As of 2016, Algeria, Bahrain, Egypt, Jordan, Saudi Arabia, Turkey, and the United Arab Emirates have all announced or initiated nuclear energy programs.[1] In addition to the new nuclear countries, Iran currently possesses a developed nuclear energy infrastructure. The recent proliferation of nuclear energy produces numerous benefits, such as creating bigger oil profits for Middle Eastern countries and a reduction of carbon emissions. However, there are potential drawbacks to nuclear energy programs. The most glaring problem is the dual purpose that a nuclear reactor can serve: creating nuclear energy, as well as creating fissile material to be used in a nuclear weapon. Former Iraqi nuclear scientist, Mahdi Obeidi, compares this dual-use of a nuclear facility to the dual use of a knife, noting that while a knife can be used to cut bread it can also be used to slit somebody's throat.[2] How a country perceives a rival countries' nuclear capability could significantly affect their nuclear decision-making. Michael Wessells describes this process as one in which "adversaries holding negative mirror images of the other each side (are) likely to misperceive the enemies intent." [3] I've termed this state behavior the perception gap, which is a gap between a states' perception of another states action and the actual policy the state is implementing. The perception gap has had a long history of occurrence in the Middle East. From 1970-1982 Iraq based their pursuit of nuclear weapons on balancing Iran's increasing nuclear capabilities. Currently, Saudi Arabia is also starting to pursue nuclear capabilities partly based on their perception of Iran's nuclear capabilities.

To explore the perception gap, this paper is broken into three sections. Section one will examine the current relationship between Saudi Arabia and Iran and the role of the JCPOA in increasing the perception gap. Section two will look at the early stages of Iraq's nuclear program and the motivations behind it. The final section will conclude with a hypothesis pertaining to future nuclear proliferation between Saudi Arabia and Iran, along with potential steps that the United States and the International Community can take in mitigating the perception gap.

Iran-Saudi Nuclear Ambitions Post JCPOA

On January 16th, 2016, the IAEA verified that Iran had met all the conditions in the JCPOA. The Obama administration deemed this day would be forever remembered as "The historic day that prevented Iran from acquiring a nuclear bomb." [4] The deal, a temporary stoppage of Iran's pursuit of nuclear weapons, could have potential ramifications for the Middle East. Ramifications are caused partially by the deals' inability to eliminate the ambiguity of Iran's nuclear program. Former IAEA Director General Mohamed ElBaradie explained "Negotiations with Iran can realistically aim to narrow, but not eliminate the ambiguity, since any country that retains the capacity to produce fissile materials under the rubric of a civil energy programme remains a 'virtual' nuclear-weapon state." [5]

The JCPOA allows for Iran to enrich uranium up to 3.67%. [6] However, a nuclear bomb requires 90% enriched uranium, [7] so Iran could not obtain a nuclear bomb solely from enriching uranium under the JCPOA. However, other countries could perceive that Iran could cheat the JCPOA and will therefore demand that their state also be allowed to enrich uranium up to 3.67%. This creates a slippery slope toward misperceptions and an arms race for a nuclear weapon. In particular, Saudi Arabia could be a primary actor causing a nuclear arms race.

The Perception Gap Over Nuclear Proliferation in the Middle East

Written by Shawn McFall

Since 2011, Saudi Arabia has pursued an accelerated path to obtain nuclear energy. This path has included nuclear energy deals with South Korea, Russia, and France.[8] Saudi Arabia currently plans to have 18 large reactors by 2032, parallel with the expiration date of the binding measures in the JCPOA.[9] After hearing the details of the Iran nuclear deal, Saudi Arabia announced that they would also pursue enriching uranium.[10] Saudi Arabia also refuses to sign additional protocols with the IAEA after signing the Small Quantities Protocol in 2006.[11] Without signing the additional protocols, Saudi Arabia's nuclear plants will not be subjected to regular IAEA inspections.[12] Along with competing with Iran's nuclear program, Saudi Arabia is currently engaged in proxy wars with Iran in Lebanon, Syria, and Yemen. The Iran-Saudi rivalry has led to an aura of suspicion and mistrust, which fuels the perception gap and could lead one country to pursue nuclear proliferation and start a Middle East arms race.

Even with the sufficient amount of evidence that Saudi Arabia is at least considering a nuclear weapons program, Robert Einhorn and Richard Nephew reject that Saudi Arabia would consider pursuing nuclear weapons. Their analysis relies on the slow start Saudi Arabia has had in nuclear energy along with the possibility of international sanctions as the means for deterring the Kingdom's pursuit of nuclear weapons.[13] Along the same lines, Lauren Sukin notes that Saudi Arabia lacks the scientific expertise and the nuclear infrastructure to pursue nuclear weapons.[14] However, both analyses fall short on the long-term ramifications of Saudi Arabia enriching uranium and the potential effects of nuclear perception.

In fact, in Einhorn and Nephew's own analysis they identify the ways in which perceptions of Iran's nuclear program can play a role in determining if countries pursue nuclear weapons. First, countries will have to depend on intelligence gathering to determine if Iran is cheating on their nuclear program.[15] Saudi Arabia could easily misinterpret intelligence and/or ignore accurate intelligence to justify pursuing nuclear weapons. Additionally, Iranian officials have already declared that they will be pursuing 190,000 SWU annually, 37 times the enrichment capacity currently allowed by the JCPOA, when the JCPOA expires.[16] Statements of this nature will widen the perception gap in Saudi Arabia and hint at Iran's possible pursuance of fissile material. The final perception gap widening measure is the distrust that Saudi Arabia has for Iran. When asked about Iran, multiple Saudi leaders replied, "Iran is an implacable opponent of Saudi Arabia and a menace to the entire region." [17] Each individual factor listed could be a potential trigger that causes the Saudis to pursue nuclear weapons. All three factors combined produce the perception of Saudi mistrust towards Iran, and signal that Saudi Arabia is willing to take any actions to deter and defeat Iran in the future.

The Iran-Saudi rivalry is similar to the Iraq-Iran rivalry during the 1970's and 1980's. 1970's Iraq decided to pursue nuclear weapons due to Iran's nuclear behavior, just like Saudi Arabia has decided to pursue nuclear capabilities because of Iran's current nuclear behavior. During both instances these states were rivals and were competing to become the regional hegemon in the Middle East. The similarities need to be further examined in a 1970-1981 Iraq case study in order to discern Iraq's motivation for a nuclear program.

Iraq-Iran Nuclear Ambitions 1970-1982

Iraq's justification for pursuing nuclear weapons relied upon Iran's pursuance of nuclear capabilities. In 1957, Iran signed a civil nuclear agreement with the United States as part of President Eisenhower's Atoms for Peace program.[18] From 1957 until the fall of the Shah in 1979, the United States was Iran's main nuclear trading partner. In 1974 the CIA conducted a top-secret study entitled "Prospects for Further Proliferation of Nuclear Weapons" which tasked the CIA with determining the future threats from potential nuclear states. Iran is mentioned once in the 50-page document with the CIA determining "If he [the Shah] is alive in the middle of the 1980s, if Iran is a full fledged nuclear power industry and all the facilities necessary for nuclear weapons... we have no doubt Iran will follow suit." [19] This report is crucial because it points out that Iran was 15 to 20 years away from obtaining a nuclear weapon.

Along with the CIA report, recently declassified state department cables help explain the intentions behind the Shah's nuclear program. The first cable, from 1974, questions the Shah's commitment to the NPT in the event of India becoming a nuclear state. The Shah is quoted as saying "I am ready to repeat what I have proposed several times, that is, to declare our zone non-nuclear." [20] In 1977, following the failure of a nuclear deal between Iran and the United States, a US diplomat met with the Shah to revive talks. When talking about a reprocessing plant, a key

The Perception Gap Over Nuclear Proliferation in the Middle East

Written by Shawn McFall

system in separating weapons grade plutonium, the Shah “made a specific disavowal of interest in reprocessing and said he was prepared to follow the fusion route.”[21] In 1978 the United States and Iran agreed to a nuclear deal in which Iran agreed to safeguards beyond the NPT requirements.[22] The following year the Shah was overthrown and the United States ended all nuclear related activity with Iran.[23]

While the majority of the Shah’s nuclear statements rejected the Iranian pursuit of nuclear weapons, a few statements portrayed that the Shah would consider nuclear weapons. Previous to the his declaration that Iran was a nuclear free zone, the Shah reacted to an Indian nuclear test by stating “Iran would possess nuclear weapons certainly sooner than believed.”[24] Following this statement, a cable between the United States Ambassador to Iran and a Department of Defense official claimed that Iran was committed to non-proliferation and that the Ambassador believed that the Shah had no intention of pursuing nuclear weapons.[25] A year later the Ambassador identified a shift in Iran, claiming that Iran might develop nuclear weapons if another state pursued nuclear proliferation.[26] By 1976, Iran was more direct with the United States and seemed to reject the possibility of pursuing proliferation. Dr. Akbar Etemad, President of the Atomic Energy Organization in Iran, stated that “Proliferation can only weaken Iran’s position vis-à-vis its neighbors, and therefore proliferation is anathema to Iran.”[27] Nuclear negotiations between the United States and Iran faltered in 1976 before a deal was agreed to on February 25th 1977.

Iran’s early nuclear history demonstrates minimal interest in nuclear weapons. However, as the CIA report pointed out, Iran had the potential to become a nuclear weapons state by the mid 1980’s. Additionally, the Shah’s statement in 1974 could be interpreted as an Iranian attempt to keep the door open for future proliferation. Iranian rejection of the 1976 nuclear deal only added to the speculation that Iran might have an alternative motive for pursuing nuclear capabilities. This nuclear ambiguity sent an unclear message to foreign actors and led some actors to pursue nuclear capabilities to balance Iran’s future potential for nuclear weapons. One of those actors was neighboring Iraq, led by Saddam Hussein.

While Iran’s nuclear capabilities were intended for peaceful use, Iraq interpreted a sinister motive within Iran and thus started to pursue nuclear weapons. Iraq purchased its first nuclear reactor in 1976 following a massive build up of Iranian nuclear energy deals.[28] Five years prior to this deal, Iran invaded and occupied two strategic islands at the mouth of the Shatt al-Arab, and therefore could threaten Iraqi navigation through the straits.[29] Consequently, Iraq started to pursue the idea of nuclear weapons in late 1971 and early 1972. Early planning for a nuclear program turned into strategic action after the 1973 oil crisis in which Saddam Hussein instructed his scientist to “closely monitor these [Iranian nuclear] developments.”[30] It is clear that the early stages of the Iraqi nuclear program were to counter any development made by Iran. The perception gap was the primary reason Iraq started pursuing nuclear weapons.

Along with Iranian pursuance of nuclear energy an alliance between Iran and Israel added to the perception gap. In 1977, Iran and Israel signed a secret agreement, known as Project Flower, which included the trade of Iranian oil for Israeli missiles that could be fitted with nuclear warheads.[31] After the bombing of the Osirak nuclear reactor in 1981, Saddam blamed the Iranian’s for colluding with the Israeli’s stating “And that is not possible with just the information and knowledge of the Mossad... So it must be in the Iranian nation. And through this and other factors you can guess why the [Iran-Iraq war] took place.”[32] Furthermore, Saddam named Iran the primary target that Iraq would have to deal with before turning Iraq’s attention to Israel. In fact, he refers to Israel as the “second objective, it is point B after point A.”[33] Before the fall of the Shah, Saddam and his cabinet viewed Israel and Iran as the same entity. This view only increases the perception gap because Saddam’s hatred for Israel blinded his view of Iranian nuclear pursuance. Project Flower would have only furthered Saddam’s perceived threat that Iran was soon to become a nuclear power.

A few modern day scholars assume that Iraq started pursuing nuclear weapons to end Israel’s nuclear monopoly, and that after obtaining a nuclear weapon Iraq would pursue a conventional war against Israel.[34] A 1979 meeting backs this account. In a meeting where Saddam and his cabinet lay out the need for a nuclear bomb, Saddam says “Go put pressure on our Soviet friends and make them understand our needs for one weapon... We want, when Israel enemy attacks our civilian establishments, to have weapons to attack the Israeli civilian establishment.”[35] In the context of the quote it would seem the driving motivation behind Iraq’s nuclear weapon is the possession of a deterrent against

The Perception Gap Over Nuclear Proliferation in the Middle East

Written by Shawn McFall

Israel. However statements made before this, like the 1974 “keep an eye on Iranian nuclear activity”, and statements made after this quote, “Iran is objective A”, characterize Iraqi motivation better than the isolated quote from 1979. These scholars’ analyses would be much better suited for the post-Osirak strike period in which Saddam made clear to his scientist his desire for nuclear weapons. Iraqi nuclear scientist Imad Khadduri writes in his memoir:

“The only logical inducement for Israel to bomb these reactors would have been to prevent Iraq from obtaining scientific and technological nuclear expertise but not nuclear weapons. In that, they apparently did not expect the gut Iraqi reaction. Get the nuclear bomb covertly and in spite of Israel.”[36]

Early Iraqi intentions for the nuclear weapons, based on the perception of Iranian nuclear capabilities, should not be conflated with Iraqi justifications after the Osirak strike.

The final perception factor that encouraged Iraq to pursue nuclear weapons was the impending war with Iran. Saddam Hussein envisioned a Pan-Arabism Middle East with Iraq as the regional hegemon. Saddam had stated that Iraq’s history gave it the right to pursue a Middle East rid of the Jews and the Persians.[37] In order to pursue this goal Iraq needed either superior conventional forces or a nuclear weapon, which could be used offensively or defensively. One month before the outbreak of the Iran-Iraq war Baranzan Ibrahim hasan al-Tikriti, Saddam’s brother, stated that Iraq needed a nuclear weapon in “order to redraw the Middle East.”[38] With Iran and Iraq both vying to be the regional hegemon, Iraq thought it was necessary to obtain nuclear weapons first to have the ability to win a war against Iran.

The perception of needing a nuclear weapon in order to defeat an enemy is true for Iran as well. Iran perceived Iraq’s nuclear weapons pursuit as a direct threat to Iranian sovereignty and therefore considered using their peaceful nuclear program as a means to pursue nuclear weapons. Former Iranian Ayatollah Akbar Hashemi Rafsanjani stated “Our [Iran’s] basic doctrine was always a peaceful nuclear application, but it never left our mind that if one day we should be threatened and it was imperative, we should be able to go down the other path.”[39] So Iraqi pursuance of nuclear weapons started because of Iran’s build up of nuclear capabilities. Then when Iraq came close to obtaining a nuclear weapon Iran began to talk about potentially pursuing nuclear weapons via their peaceful nuclear energy program.

This vicious cycle precisely demonstrates the perception gap. If a state with a peaceful nuclear energy program perceives threats, the state can start the process of pursuing nuclear weapons. When two nuclear states are inherent enemies or competing to become the regional hegemon, both states will assume that each nuclear program is for nuclear weapons. This perception fuels mistrust and leads state actors to pursue a more aggressive strategy, which in turn leads the opposing state to adopt an aggressive strategy. Empirically, ambiguity of a states intention along with a competition for regional hegemon has fueled regional arm races.[40] The early stages of Iran and Iraq’s nuclear program provide an example of how nuclear programs and perceptions can cause a nuclear arms race.

Narrowing the Perception Gap

The ongoing challenge for the United States and the International Community is the ambiguity of Saudi Arabia and Iran’s nuclear program. In fact, Ivanka Barzashka and Ivan Oelrich speculate that the Iranian problem revolves around “the possibility that Iran might be working toward a nuclear bomb”, and that in response countries like Saudi Arabia will “lack absolute assurances.”[41] Barzashka and Oelrich continue to argue that perceptions and war could spark a rush for both countries to complete a bomb.[42] This has historical backing considering the internal Iranian talks about pursuing a nuclear weapon during the Iran-Iraq war.

In order to prevent an arms race the United States needs to accomplish a few key goals. Since Saudi Arabia demands nuclear equality with Iran the United States should allow for Saudi Arabia to enrich uranium up to 3.67%. In return, Saudi Arabia should have to sign additional IAEA protocols that would allow for regular scheduled IAEA inspections. This compromise is necessary because the IAEA can act as an assurance tool for both countries. While transparency does not guarantee that other countries will not suffer from the perception gap, it eliminates some of the speculation the countries will have to make.

The Perception Gap Over Nuclear Proliferation in the Middle East

Written by Shawn McFall

Second, the United States and other members of the IAEA need to increase funding and personnel to the IAEA. There has been some concern that the Iranian deal will lead the IAEA to be overstretched.[43] This overstretch would leave the IAEA incapable of fully monitoring nuclear sites. If Saudi Arabia and/or Iran believe the IAEA is incapable of monitoring all nuclear sites then the perception gap will exponentially grow. IAEA reports will be discredited and countries could claim that the IAEA is being discriminatory in their monitoring practices, which could lead to a rejection of inspectors. IAEA credibility is a top concern and therefore it should be funded and staffed to its fullest capacity.

Nuclear energy's recent renaissance has led some states to perceive other states as potential nuclear weapons states. This perception gap is the main driver in a state's decision-making calculus on whether a state shall pursue nuclear bombs. The United States and the international community need to shift the current perception of a nuclear reactor, a knife for slitting throats – to a more positive perception, a knife for cutting bread. If there is no shift in perception then there is potential for a nuclear arms race in the Middle East.

Bibliography

- Bahgat, Gawdat. "Nuclear Proliferation: The Islamic Republic of Iran." *Iranian Studies* 39, no. 3 (2006): 307-327.
- Baram, Amatzia. "An analysis of Iraqi WMD strategy." *The Nonproliferation Review* 8, no. 2 (2001): 25-39.
- Barzashka, Ivanka, and Ivan Oelrich. "Iran and nuclear ambiguity." *Cambridge Review of International Affairs* 25, no. 1 (March 2012): 1-26.
- Bluth, Christoph, Matthew Kroenig, Rensselaer Lee, William Sailor, and Matthew Fuhrmann. "Civilian Nuclear Cooperation and the Proliferation of Nuclear Weapons." *International Security* 35, no. 1 (Summer 2010): 184-200.
- Brands, Hals, and David Palkki. "Saddam, Israel, and the Bomb: Nuclear Alarmism Justified?" *International Security* 36, no. 1 (Summer 2011): 133-166.
- Braut-Heggahmer, Malfrid. "Revisiting Osirak: Preventive Attacks and Nuclear Proliferation Risks." *International Security* 36, no. 1 (Summer 2011): 101-132.
- Burr, William. "A brief history of U.S.-Iranian nuclear negotiations." *Bulletin of Atomic Scientist*. January/February 2009. <http://thebulletin.org/2009/january/brief-history-us-iranian-nuclear-negotiations>.
- Chesser, Ronald K., Brenda E. Rodgers, Mikhail Bondarkov, Esmail Shubber, and Carleton J. Phillips. "Piecing together Iraq's nuclear legacy." *Bulletin of Atomic Scientist*. May/June 2009. <https://www-ns.iaea.org/downloads/rw/projects/iraq/documentation/piecing-together-iraqs-nuclear-legacy.pdf>.
- Director of Central Intelligence. *Prospects For Further Proliferation of Nuclear Weapons*. Top Secret , Washington DC: CIA, 1974.
- Einhorn, Robert, and Richard Nephew. *The Iran Nuclear Deal: Prelude to Proliferation in the Middle East?* Paper 11, Brookings Institute , Washington DC: Foreign Policy at Brookings, 2016.
- Feldman, Shai. "A bigger Danger Than Iran." *New York Times*. April 4, 1995. <http://www.nytimes.com/1995/04/04/nyregion/news-summary-707995.html>.
- Feldman, Shai. *Nuclear Weapons and Arms Control in the Middle East*. Cambridge, Massachusetts: Center for Science and International Affairs, 1997.
- Ferguson, Charles D. "Next customer, please: The risk in conventional arms sales along with nuclear energy deals." *Bulletin of the Atomic Scientists* 66, no. 6 (2010): 36-42.

The Perception Gap Over Nuclear Proliferation in the Middle East

Written by Shawn McFall

Fuhrmann, Matthew. "Spreading Temptation: Proliferation and Peaceful Nuclear Cooperation Agreements ." *International Security* 34, no. 1 (Summer 2009): 7-41.

Full Text of the Iran Nuclear Deal. July 14, 2015. <http://apps.washingtonpost.com/g/documents/world/full-text-of-the-iran-nuclear-deal/1651/>.

Guzansky, Yoel. "The Saudi Nuclear Genie is Out." *The Washington Quarterly* 38, no. 1 (2015): 93-106.

Hamza, Khidhir, and David Albright. "Inside Saddam's secret nuclear program." *Bulletin of Atomic Scientists* 54, no. 5 (1998): 26-33.

Hibbs Mark. "Vigorous Verification in Iran." *Carnegie Endowment For International Peace*. June 28th, 2016. <<http://carnegieendowment.org/2016/06/28/vigorous-verification-in-iran-pub-63946>>.

"Iran." *National Threat Initiative*. March 2016. <http://www.nti.org/learn/countries/iran/nuclear/>.

James, Carolyn C. "Iran and Iraq as rational crisis actors: Dangers and dynamics of survivable Nuclear War." *Journal of Strategic Studies* 23, no. 1 (2000): 52-73.

Khadduri, Imad. *Iraq's Nuclear Mirage: Memoirs and Delusions*. Richmond Hill, Ontario: Springhead Publishers, 2003.

Laymen, Edwin. "Weapon Material Basic." *Union for Concerned Scientist*. August 2004. <http://www.ucsusa.org/nuclear-weapons/nuclear-terrorism/fissile-materials-basics#.WPVMrIPys6U>.

Litwak, Robert S. "Living with Ambiguity: Nuclear Deals with Iran and North Korea." *Survival* 50, no. 1 (2008): 91-118.

National Security Archive Electronic Briefing Book No. 268, U.S. Embassy Paris cable 15305 to Department of State, "Interview with Shah," 24 June 1974, Unclassified, <<http://nsarchive.gwu.edu/nukevault/ebb268/doc01a.pdf>>.

National Security Archive Electronic Briefing Book No. 268, U.S. Embassy Paris cable 15445 to Department of State, "Further Remarks by Shah on Nuclear Weapons," 25 June 1974, Confidential, <<http://nsarchive.gwu.edu/nukevault/ebb268/doc01b.pdf>>.

National Security Archive Electronic Briefing Book No. 268, U.S. Embassy Tehran cable 5389 to Department of State, "Iran's Intentions in Nuclear Matters," 1 July 1974, Confidential, <<http://nsarchive.gwu.edu/nukevault/ebb268/doc01d.pdf>>.

National Security Archive Electronic Briefing Book No. 268, Tehran Embassy cable 5939 to State Department, "Multinational Nuclear Centers: Assessment of Iranian Attitudes toward Plutonium Reprocessing," 17 July 1975, Secret, <<http://nsarchive.gwu.edu/nukevault/ebb268/doc07.pdf>>.

National Security Archive Electronic Briefing Book No. 268, U.S. Embassy Tehran cable 5765 to State Department, "Iranian Views on Non-Proliferation and US/Iran Nuclear Cooperation," 7 June 1976, Secret, <<http://nsarchive.gwu.edu/nukevault/ebb268/doc19b.pdf>>.

National Security Archive Electronic Briefing Book No. 268, U.S. Embassy Tehran cable 5397 to State Department, "Audience with Shah," 20 June 1977, Confidential, <<http://nsarchive.gwu.edu/nukevault/ebb268/doc30.pdf>>.

Nikou, Semira N. "The Iran Primer." *U.S. Institute for Peace*. December 2015. <http://iranprimer.usip.org/resource/timeline-irans-nuclear-activities>.

The Perception Gap Over Nuclear Proliferation in the Middle East

Written by Shawn McFall

Obeidi, Mahdi, and Kurt Pitzer. *The Bomb in My Garden: The Secrets of Saddam's Nuclear Mastermind*. Hoboken, New Jersey: John Wiley & Sons Inc., 2004.

Ramana, M. V., and Zia Mian. "Scrambling to sell a nuclear Middle East." *Bulletin of the Atomic Scientists* 72, no. 1 (2016): 39-43.

Rider, Toby J. "Uncertainty, Salient Stakes, and the Causes of Conventional Arms Races." *International Studies Quarterly* 57 (2013): 580-591.

Sciolino, Elaine. "DOCUMENTS DETAIL ISRAELI MISSILE DEAL WITH THE SHAH." *New York Times*. April 1, 1986. <http://www.nytimes.com/1986/04/01/world/documents-detail-israeli-missile-deal-with-the-shah.html?pagewanted=all>

Sukin, Lauren. "Beyond Iran: Containing Nuclear Development in the Middle East." *The Nonproliferation Review* 22, no. 3-4 (2015): 379-400.

The White House. *The Historic Deal that Will Prevent Iran from Acquiring a Nuclear Weapon*. January 16, 2016. <https://obamawhitehouse.archives.gov/issues/foreign-policy/iran-deal>.

Wessells, Michael G. "Social-Psychological Determinants of Nuclear Proliferation: A Dual-Process Analysis." *Peace and Conflict Journal of Peace Psychology* 1 (1995): 49-65.

Wilkin, Sam. "Iran considered nuclear weapons during 1980s Iraq war, ex-president says." *Reuters*. October 29, 2015. <http://www.reuters.com/article/us-iran-nuclear-rafsanjani-idUSKCN0SN0E720151029>.

Woods, Kevin M., David D. Palkki, and Mark E. Stout. *The Saddam Tapes: The Inner Workings of a Tyrant's Regime 1978-2001*. New York, New York: Cambridge University Press, 2011.

Notes

[1] Eric S. Edleman, Andrew F. Krepinevich, and Evan (2011), Braden Montgomery, "The Dangers of a Nuclear Iran", *Foreign Affairs*, Vol. 90, No. 1 (January/February <<https://www.foreignaffairs.com/articles/persian-gulf/2011-01-01/dangers-nuclear-iran>>.

[2] Mahdi Obeidi, and Kurt Pitzer, *The Bomb in My Garden: The Secrets of Saddam's Nuclear Mastermind* (Hoboken, New Jersey: John Wiley & Sons Inc. 2004) p. 39.

[3] Michael G. Wessells, "Social-Psychological Determinants of Nuclear Proliferation: A Dual-Process Analysis." *Peace and Conflict Journal of Peace Psychology* 1 (1995): p. 4.

[4] The White House, "The Historic Deal that Will Prevent Iran from Acquiring a Nuclear Weapon," January 16, 2016, <https://obamawhitehouse.archives.gov/issues/foreign-policy/iran-deal>.

[5] Robert S. Litwak, "Living with Ambiguity: Nuclear Deals with Iran and North Korea," *Survival* 50, no. 1 (2008): p. 4.

[6] See: *Full Text of the Iran Nuclear Deal*. July 14, 2015. <http://apps.washingtonpost.com/g/documents/world/full-text-of-the-iran-nuclear-deal/1651/>.

[7] Edwin Laymen, "Weapon Material Basic," *Union of Concerned Scientist*, August 2004, <http://www.ucsusa.org/nuclear-weapons/nuclear-terrorism/fissile-materials-basics#.WPVMrIPys6U>.

[8] M. V. Ramana and Zia Mian, "Scrambling to sell a nuclear Middle East", *The Bulletin of the Atomic Scientists*,

The Perception Gap Over Nuclear Proliferation in the Middle East

Written by Shawn McFall

Vol. 72, No. 1 (2016), p. 40, <<http://thebulletin.org/2016/january/scrambling-sell-nuclear-middle-east9078>>.

[9] IBID, p. 40.

[10] Yoel Guzansky, "The Saudi Nuclear Genie is Out," *The Washington Quarterly* 38, no. 1 (2015): p. 94.

[11] Lauren Sukin, "Beyond Iran: Containing Nuclear Development in the Middle East," *The Nonproliferation Review* 22, no. 3-4 (2015): p. 383.

[12] IBID. p. 383.

[13] Robert Einhorn, and Richard Nephew, *The Iran Nuclear Deal: Prelude to Proliferation in the Middle East?* Paper 11, Brookings Institute, Washington DC: Foreign Policy at Brookings, 2016 p. 33.

[14] Sukin, p. 384-385.

[15] Einhorn and Nephew, p. 28.

[16] IBID. p. 28.

[17] IBID. p. 33.

[18] Semira N. Nikou, "The Iran Primer" *United States Institute for Peace*, December 2015, <http://iranprimer.usip.org/resource/timeline-irans-nuclear-activities>.

[19] Director of Central Intelligence, *Prospects For Further Proliferation of Nuclear Weapons*, Top Secret, Washington DC: CIA, 1974.

[20] National Security Archive Electronic Briefing Book No. 268, U.S. Embassy Paris cable 15445 to Department of State, "Further Remarks by Shah on Nuclear Weapons," 25 June 1974, Confidential <<http://nsarchive.gwu.edu/nukevult/ebb268/doc01b.pdf>>.

[21] National Security Archive Electronic Briefing Book No. 268, U.S. Embassy Tehran cable 5397 to State Department, "Audience with Shah," 20 June 1977, Confidential <<http://nsarchive.gwu.edu/nukevult/ebb268/doc30.pdf>>.

[22] Nikou

[23] "Iran" *National Threat Initiative*, March 2016, <http://www.nti.org/learn/countries/iran/nuclear/>.

[24] National Security Archive Electronic Briefing Book No. 268, U.S. Embassy Paris cable 15305 to Department of State, "Interview with Shah," 24 June 1974, Unclassified <<http://nsarchive.gwu.edu/nukevult/ebb268/doc01a.pdf>>.

[25] National Security Archive Electronic Briefing Book No. 268, U.S. Embassy Tehran cable 5389 to Department of State, "Iran's Intentions in Nuclear Matters," 1 July 1974, Confidential <<http://nsarchive.gwu.edu/nukevult/ebb268/doc01d.pdf>>.

[26] National Security Archive Electronic Briefing Book No. 268, Tehran Embassy cable 5939 to State Department, "Multinational Nuclear Centers: Assessment of Iranian Attitudes toward Plutonium Reprocessing," 17 July 1975, Secret <<http://nsarchive.gwu.edu/nukevult/ebb268/doc07.pdf>>.

[27] National Security Archive Electronic Briefing Book No. 268, U.S. Embassy Tehran cable 5765 to State Department, "Iranian Views on Non-Proliferation and US/Iran Nuclear Cooperation," 7 June 1976, Secret

The Perception Gap Over Nuclear Proliferation in the Middle East

Written by Shawn McFall

<<http://nsarchive.gwu.edu/nukevault/ebb268/doc19b.pdf>>.

[28] Shai Feldman, *Nuclear Weapons and Arms Control in the Middle East* (Cambridge, Massachusetts: Center for Science and International Affairs, 1997) p. 135.

[29] Amatzia Baram, "An analysis of Iraqi WMD strategy," *The Nonproliferation Review* 8, no. 2 (2001): p. 27.

[30] Malfrid Braut-Heggahmer, "Revisiting Osirak: Preventive Attacks and Nuclear Proliferation Risks," *International Security* 36, no. 1 (Summer 2011): p. 106.

[31] Elaine Sciolino, "DOCUMENTS DETAIL ISRAELI MISSILE DEAL WITH THE SHAH," *New York Times*, April 1, 1986, <http://www.nytimes.com/1986/04/01/world/documents-detail-israeli-missile-deal-with-the-shah.html?pagewanted=all>.

[32] Kevin M. Woods, David D. Palkki, and Mark E. Stout, *The Saddam Tapes: The Inner Workings of a Tyrant's Regime 1978-2001* (New York, New York: Cambridge University Press, 2011) p. 81.

[33] IBID. p. 226

[34] See: Hals Brands, and David Palkki, "Saddam, Israel, and the Bomb: Nuclear Alarmism Justified?" *International Security* 36, no. 1 (Summer 2011).

[35] Woods, Palkki, and Stout, p. 223.

[36] Imad Khadduri, *Iraq's Nuclear Mirage: Memoirs and Delusions* (Richmond Hill, Ontario: Springhead Publishers, 2003) p. 82.

[37] Woods, Palkki, and Stout, p. 87.

[38] Baram, p. 28.

[39] Sam Wilkin, "Iran considered nuclear weapons during 1980s Iraq war, ex-president says," *Reuters*, October 29, 2015, <http://www.reuters.com/article/us-iran-nuclear-rafsanjani-idUSKCN0SN0E720151029>.

[40] See: Toby J. Rider, "Uncertainty, Salient Stakes, and the Causes of Conventional Arms Races," *International Studies Quarterly* 57 (2013).

[41] Ivanka Barzashka, and Ivan Oelrich, "Iran and nuclear ambiguity," *Cambridge Review of International Affairs* 25, no. 1 (March 2012): p. 17.

[42] IBID. p. 17.

[43] Mark Hibbs, "Vigorous Verification in Iran," *Carnegie Endowment For International Peace*, June 28th, 2016, <<http://carnegieendowment.org/2016/06/28/vigorous-verification-in-iran-pub-63946>>.

Written by: Shawn McFall
Written at: Claremont McKenna University
Written for: Lisa Langdon Koch
Date written: April/2017