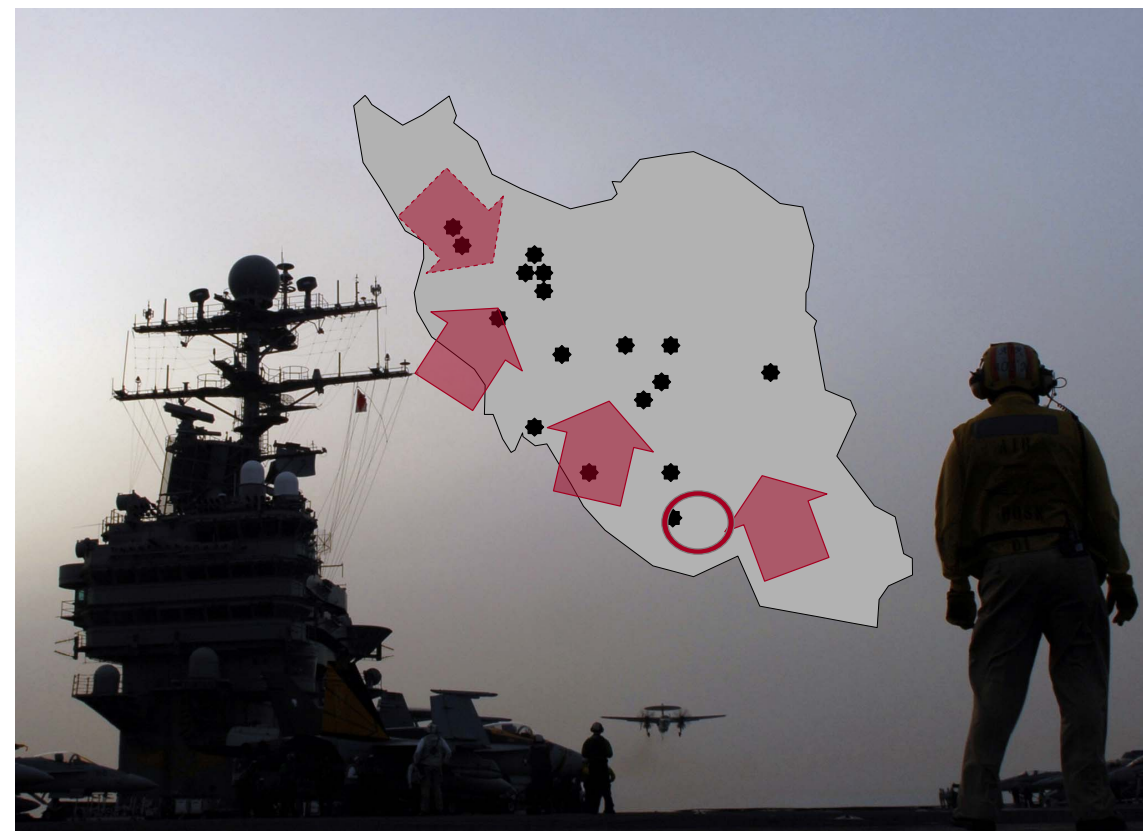


EDITORS: JOHN RYDQVIST, KRISTINA ZETTERLUND



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Editors: John Rydqvist, Kristina Zetterlund

Consequences of Military Actions Against Iran

Final Report

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Sammanfattning

Syftet med denna rapport är att bedöma möjliga konsekvenser av militära insatser mot Irans kärntekniska infrastruktur. I rapportens första del beskrivs den amerikanska Iranpolitiken och dess övergripande syften varefter två realistiska och trovärdiga anfallsscenarier konstrueras. Rapporten syftar inte till att göra en bedömning av huruvida sådana anfall är troliga. Istället utgör scenarierna en grund för analysen av troliga konsekvenser av ett sådant anfall.

I rapportens andra och tredje delar behandlar flera geografiskt eller funktionellt definierade kapitel troliga konsekvenser.

Utfallen efter en attack omfattar en stor mängd potentiella konsekvenser. En nyckelfråga är om attackerna bedöms vara lyckade eller inte. Vad som kan ses som lyckade militära insatser för att kraftigt fördröja Irans kärnkraftsprogram kan ur andra perspektiv ses som misslyckanden. Jämförelsen med efterspelet till Irakkriget är stark. En konsekvensbedömning är att de militära och mer hårdföra elementen i den iranska regimen troligen skulle stärkas. Reformister både inom och utanför regimen skulle samtidigt försvagas. Förutom de negativa inrikespolitiska konsekvenserna skulle militära insatser ytterligare stärka det geopolitiska maktspelet och konkurrensen i Mellanöstern och Gulf-regionen och ytterligare spä på motsättningar. Men om Iran tillåts skaffa kärnvapen väntas effekterna också blir omfattande.

Nyckelord: Iran, Iranpolitik, Mellanöstern, kärnvapen, Irans kärnkraftsprogram, attack mot Iran, slå ut kärnanläggningar, konsekvenser av en attack mot Iran

Summary

The main question on which this report elaborates is what consequences military actions against Iran's nuclear infrastructure would have. The first part of the report outlines the political and strategic context in which such an attack would be executed. Two possible US military operations against Iran's nuclear infrastructure are then presented. The attack scenarios are tailored to have high plausibility given current political and strategic realities. However, the report does not assess the likelihood of possible attacks, although press reporting and speculation to that effect have influenced this research. Instead, the attack scenarios were constructed as a starting point for the main question to be addressed – the domestic and international consequences of such an attack.

Chapters in parts two and three of the report take the attack scenarios as a starting point and assess consequences of military attacks from the perspective of various geographically and functionally defined themes.

There is a wide scope of potential consequences regardless of whether any attacks are deemed a success or failure. What may be deemed a success in discontinuing the nuclear programme may be deemed a failure in terms of, for example, human rights, future power struggles in the Middle East or from an economic point of view. A likely consequence of an attack, be it successful or not with regard to the future of Iran's nuclear programme, is that it would make it harder for modernising and reform-orientated forces in Iran to operate and find traction for their ideas and agenda. This, in turn, would affect the "new great power game" in the Gulf region and further reinforce the primacy of realist geopolitical power tendencies in the greater Middle East.

Keywords: Iran, Iran policy, Middle East policy, nuclear weapons, nuclear power, attack scenarios, US-Iran controversy, consequences of attacks against Iran

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Project Manager's Remarks

This final report on the consequences of military action towards Iran builds on work done within a project group at the Swedish Defence Research Agency throughout 2007. The project issued a preliminary report in April 2007.

I am especially grateful to Gary Samore from the Council on Foreign Relations, who in connection with a conference hosted by the project in Stockholm in October 2007 read and made invaluable comments on an earlier draft of the report. I also want to thank Shlomo Brom, Patrick Cronin, Niklas Granholm, Walter Posch, Stefan Ring, Mohammed Shakeel, Manouchehr Takin and Mike Winnerstig, all of whom took time to participate in the October conference. Their insights and expertise were a great source of knowledge and the conference gave valuable input to the project and this final report.

The texts to varying extent are updated to include developments as of early 2008. As Washington's focus coupled to military means arguably has shifted since spring 2007 this report may be less timely than was a preliminary report issued by the project in the spring of 2007. This shift of focus from Iran's nuclear installations to Iranian help to Iraqi insurgents has changed the political discourse and interest. However I hope that the report still can stimulate discussion on the Iran controversy.

John Rydqvist

Head of Project, Asian Security Studies

Swedish Defence Research Agency - FOI

Executive Summary

This report comprises the last part of a project tasked to carry out analyses and predict consequences in the event of an attack on Iran. It updates and expands a preliminary report published in April 2007. The preliminary report was the result of a workshop in mid-March 2007 and was written, edited and disseminated within a week. The March 2007 workshop, an international conference held in Stockholm in October 2007 and the overall 'evolutionary' characteristics of this project have provided the Swedish Defence Research Agency (FOI) with the readiness to quickly inform Swedish decision-makers in the event of an attack. This final report is a summation and update of the analysis and arguments worked on in 2007.

The core question in the report is:

If the United States, with or without allies, were to decide that the only remaining option in dealing with Iran was to resort to the use of force, what would be the consequences?

Setting the stage – an American attack and the Iranian response

- A US military campaign would most likely entail conventional air attacks. Some kind of economic blockade, support to an Iranian insurgency and special forces operations in Iran are other possible components of an American attack.
- Main targets would be vital nodes within the Iranian nuclear programme and more traditional military targets, e.g. the Iranian integrated air defence system.
- Iran's military defences would not cause much difficulty for US offensive operations. Tehran's partly upgraded air defence system would probably have a significant impact only on military operations of other powers, e.g. Israel. Iran's large standing military force is predominantly outdated.

- Iran could choose to respond or not. Potential counter-offensive means include ballistic missiles, paramilitary operations or supporting proxies abroad.
- Targets for possible Iranian offensive actions could be US forces in Iraq, US interests in the region, e.g. in Afghanistan or the emirates. Other targets could be oil infrastructure or sea lines of communication in the Gulf. However, such actions would be of dubious benefit to Tehran because of the dire state of Iran's economy, its dependency on imports (e.g. petrol) and its need for long-term credibility as an oil supplier.

Success or failure – how the American attack would be perceived

The question of whether an American attack on Iran would be perceived as a failure or success can be answered from at least three perspectives. The first has more of a military connection and is concerned with whether the military plan is adequate and whether the military operation is well executed. Although there are always risks in military activities, a fair guess is that an attack would probably not be perceived as a failure from the first perspective. If one looks at recent US military experience and current capabilities, there is a reasonable chance of success. The second perspective concerns whether the direct goal is achieved. If the objective of the attack were to delay a potential Iranian nuclear weapons programme, the key factors would be the intelligence available and the de facto state of the nuclear programme. Lack of intelligence could be compensated for by more extensive attacks, but the more military offensive measures, the more political risks. The third perspective concerns whether the overall political ambition is met. Typical aspects of this kind are the long-term impact on security in the Middle East and American security interests, and also US reputation and influence in other parts of the world. Key factors for failure and success from the latter two perspectives are the framing and specific political conditions surrounding an attack, but also the impact on the Iranian national decision-making apparatus and its response. These two perspectives are more complicated and would probably be the main focus of politicians and the general public.

Postlude – The consequences of an attack

As there is a wide scope of potential consequences regardless of whether attacks are deemed a success or failure the reader will benefit greatly from the detailed discussions in each chapter. Nevertheless some key observations are listed below.

- The effects of a military attack on the Iranian nuclear programme are uncertain. Four possible outcomes are that it ends; it is stalled or delayed; it is left unaffected; or it is accelerated.
- No state in the Gulf region would want to see Iran acquire nuclear weapons. The majority of them view Iran's regional ambitions with some concern and some may even welcome a limited attack in order to eliminate any WMD programme.
- A limited aerial attack against Iran would in all likelihood not lead to a major regional war. The risk of another state in the region exploiting a US military campaign to launch an attack on Iran is highly unlikely.
- Should Iran acquire nuclear capability, this would most likely trigger an arms race in the region, with countries such as Egypt and Saudi Arabia attempting to acquire their own nuclear arsenals.
- The regimes and governments in the Middle East and Gulf regions would face the risk of various groupings and popular movements with Islamic and anti-western sympathies expressing strong grievance towards the US. Strong support for a US attack from these regimes would risk causing widespread protests and possible riots. Such consequences would be serious for the affected regimes because they risk further undermining the legitimacy of the ruling elite as well as bringing further destabilization to these states.
- Military action against Iran could possibly boost anti-American sentiments in Russia, which are already strong.
- An attack on Iran would most likely be used by the Russian military as a reason to strengthen its air and space defence and its airforce.
- Russia could score points in its resistance to US missile defence facilities in Europe, as it could argue that such facilities would no longer be needed given a diminished or removed 'Iranian threat'.

- The potential for political crises within the EU and NATO, and between their member states, could depend on whether individual states choose to take an uncompromising stance. Single member states could react strongly without it having to lead to a crisis if those actions are limited to the domestic arena and are kept out of multilateral fora.
- European politicians would be more cautious to position themselves strongly for or against a limited US military action against Iran's nuclear infrastructure in light of the European crisis after the Iraq invasion 2003.
- The European reaction would be more negative if the attack would entail great environmental damage or massive human casualties.
- A small-scale attack against Iran's nuclear infrastructure would be of less concern to China than an attack that targets economic or energy infrastructure.

Introduction

Within the Swedish Defence Research Agency's Division for Defence Analysis, the project Asian Security Studies is responsible for generating political and geostrategic assessments in areas of security concern. In planning research and studies conducted during 2007, the crucial issue of the controversy over Iran's nuclear ambitions and possible military actions against nuclear facilities came to centre stage.

As Iran has been the topic of countless studies and articles, one wonders if there is anything to add. However, on closer scrutiny one issue remains fairly unexplored. If Washington decided that military force remained the only option left to deal with Iran's nuclear ambitions and attacks where made against Iran's nuclear installations, what effects would that have?

This question naturally presents a complicated and challenging task involving a considerable amount of guesswork. However decision-makers rarely have the luxury of being able to wait for researchers to make empirical facts available. Rather it is the task of decision-makers to prepare for, and act on, assumptions about the future. Thus someone must think the issues through. It was within this context that the current project was established.

Scope of the study

In late 2006 and early 2007, when the project was being planned, possible conventional US attacks on Iran were not the only topic of debate. At that time, speculation about possible Israeli attack plans and even combined Israeli and US nuclear attack plans against Iran ran high in the media. While the scenario of nuclear weapons being used against Iran was deemed highly unlikely for the time being, the issue of possible Israeli strikes demanded more attention. The project team therefore set out to assess Israeli capabilities and strategic opportunities. The result of this preliminary assessment of Israel's military capability and political manoeuvrability convinced us that Israeli strikes would be difficult and come at a very high political price. Thus it was assessed as a last option in the face of imminent Iranian nuclear weapons procurement. The assessment of Israel, although of great interest, was carried out as a

preliminary study in order to refine the study's core question and is therefore not presented in this report.

A similar assessment of US capabilities, strategy and intentions convinced us that military strikes were a possible course of action and that there was a non-zero possibility that such would occur during the remainder of President George W. Bush's time in office. This allowed us to formulate the main question of this study:

If the United States, with or without allies, were to decide that the only remaining option in dealing with Iran was to resort to the use of force, what would be the consequences?

The report is divided into three parts:

Part 1 of this report (Setting the Stage – The US, Iran and the Attack Scenario) comprises two chapters. In the first of these, possible US attack scenarios are discussed and constructed from the perspective of policy, strategy, doctrine and military capability. Chapter 2 addresses Iran's strategic considerations and military capability. The hypothetical attack scenarios constructed in the two chapters of Part 1 form the basis for analysis of the potential consequences of such an attack.

Part 2 (Consequences – Regional Contexts) is made up of five chapters that make predictions about the consequences in the wake of a US attack as outlined in Part 1. Chapter 3 assesses the impact and consequences in the Gulf region, Chapter 4 addresses the internal Iranian response to attacks, Chapter 5 analyses Russian reactions and courses of action, Chapter 6 deals with Europe and Chapter 7 addresses US perspectives.

Part 3 (Functional Assessments), Chapter 8 assesses the possible economic consequences of an attack, while Chapter 9 makes some observations about possible bombings of Iranian nuclear sites and possible risks of radioactive leakage and contamination. Chapter 10 addresses the issues from the international law perspective.

The concluding section sums up the report and presents the key findings of the project.

Appendix 1 presents some basic facts on the Iranian economy.

It is acknowledged that the contents of the consequences part of the report, comprising chapters three through ten, do not reflect the full range of issues that could be discussed in a consequence analysis of an attack against Iran. Obvious missing issues include consequences in South Asia and Afghanistan, Southeast Asia as well as East Asia. Several other issues such as general chapters on Islamic radicalisation in general, transport security and energy transport strategies etc. could also be envisaged. But due to the resources available to the project these and other issues had to be left out in the final report.

Methods and working order

Having identified a need to address the issue of Iran in the context of possible military confrontation and having decided upon the core perspective of consequences of possible US attacks, methodology problems came to the fore. The first was that the key question required predictions of the future. Studies of the future are naturally fraught with a number of methodological problems. The non-zero possibility of a US attack on Iran during the course of the study was also a problem that had to be addressed methodologically. The risk of being overtaken by events, possibly degrading the relevance of the study both as a document and as a decision-making tool, had to be taken into account when constructing the workflow. The holistic nature of the determinant of the general question – consequences – was yet another methodological challenge. The scope and complexity of the study clearly required a broad range of expertise, as well as well-defined limits.

Studying the future – possible and relevant?

The first challenge, that of making analyses based on possible future events, is the most difficult to address. Extensive research into methods for predicting the future can only partly compensate for the obvious. The future is an unknown for which no empirical facts exist. True scientific research as understood in academia is therefore highly limited. Nevertheless, decision-makers frequently demand predictions about the future as part of the decision-making process. The nature of politics in fact means that many decisions must be taken on the basis of assessments of future developments. In doing this, one is often faced with

considerable uncertainties. This is especially true for political developments.

The discrepancy between scientific rigour and the needs of decision-makers have driven the development of methodologies to refine and improve the ability of analysts to predict the future. A core subject within future studies is the development of scenario theory. Scenario is a term used to describe several common practices or methods to generate a range of possible futures. Scenarios can be constructed using a variety of methods applied to diverse problems. A classic case of scenario methodology is within military operational analysis, where complexity is great but a certain degree of instrumentality can be justified. Applied to politics and international relations, scenario work becomes even more complex and uncertainties are bound to be even greater.

The single most common misunderstanding about future studies and scenario work is that the most likely future or futures will be generated and that this is the important outcome. Certainly likely futures can be generated, but the future that any scenario generates will never fully correspond to that which materialises. The role of future analysis is rather to present future developments that cannot be excluded or that have a non-zero possibility of occurring. This fact is crucial for understanding the power of forward looking analysis. One of the great virtues of future analysis is that it forces decision-makers to think through and be aware of uncertainties in an orderly and more rigid manner and helps them to avoid assuming a precisely determined and predictable future. By being made aware of this they are (theoretically) forced to maintain a greater degree of freedom of action, i.e. not all resources can be allocated towards a specific future. This is coupled with the well-known dictum that the future will always be full of surprises and that we will always be surprised. This makes scenarios a double-edged sword. It gives important guidance but that guidance can and often will be more or less wrong. Bearing this in mind, scenarios can still be very useful because they can increase the mental and political preparedness for major challenges ahead. They cannot eliminate the element of surprise, but shorten the reaction time after radical changes occur.

The scenario method decided upon in this study is a variant of forecasting, a method to study the future where one begins by identifying

current trends. These are then developed on a step by step basis using logic reasoning and theoretical models from the present into the future.¹ This kind of scenario work has some advantages and some drawbacks. Since forecasting is completely based on what we know today, the futures it generates will probably achieve some degree of relevance and plausibility. The results will not deviate radically from today's world but will still identify a range of possible trends and key changes. Given this, the forecasted scenarios are good tools for policymakers who need relevant and plausible trends and futures on which to base their decisions.

Scenarios in this study were generated in two phases, the first of which concerned possible military attacks by the US against Iran. This process was carried out top to bottom and began by charting and assessing stated US policy and objectives in the Gulf Region and the circumstances and objectives under which the US would attack Iran. Having done this, the analysis moved on to a military operational focus with the objective of establishing militarily viable options of attacking Iran in support of US policy. Once the military scenarios had been generated, two were chosen as 'main' attack scenarios to be used in phase two. The final results of this first scenario phase are described in Chapters 1 and 2 in Part 1 of this report. The writers of the subsequent chapters in Parts 2 and 3 of the report were instructed to take Chapters 1 and 2 as starting points for their analyses. However, writers were given freedom to interpret exactly how to take Chapters 1 and 2 into account. This is apparent in the individual chapters and is due to both the topic covered in each of the chapter and the interpretation of the writer.

Phase two of scenario generation used the two 'main' attack scenarios as a point of departure for analysis of the main question, i.e. the consequences of US military actions against Iran. Methodologically one can argue that carrying out forecasting scenario work on the basis of speculative events such as a presumed attack against Iran further weakens the results. The method was chosen despite these shortcomings because it presented the best way of structuring the analytical work and addressing this inherently difficult undertaking.

¹ Karl Henrik Dreborg: "Essence of Backcasting", *Futures*, Vol. 28, No. 9 (1996), p. 816

Timing and the risk of being overtaken by events

The second methodological problem was the risk of being overtaken by events, i.e. an attack on Iran occurring in the course of the project. Such a development would arguably render a final report several months later more or less useless. To come to grips with this risk, a working order was constructed so as to hedge against such an event and turn it to a potential advantage.

In both academic and intelligence methodology, a research project normally consists of several interrelated steps. The research or analysis process can be envisioned as a circle in which the researcher moves around. In the ideal project the analyst moves clockwise from the *question/requirements* phase, via the *collection* and *analysis* phases before finally reaching the *dissemination* phase, where the results are communicated to a consumer.² The first objective of the present project was to construct the analysis cycle so as to allow for flexibility and accelerated research efforts in the event of an attack occurring. The objective was to use the knowledge generated within the project to produce a quick assessment of consequences and disseminate results to decision-makers shortly after the attack had occurred, while letting the project run its course as long as no attack occurred.

The methodology chosen to fulfil the objectives stated above was in the form of a multi-cycle approach, where the full analysis circle was worked through several times in conjunction with seminars. The envisioned project steps were:

1. Construction of the attack scenario as a basis for further consequence analysis.
2. A first preliminary consequence analysis with a written dissemination within one week.
3. A thoroughly researched analysis and final report.
4. A seminar with international experts to test the findings of the final report and receive further input to that report.

² Michael Herman, *Intelligence Power in Peace and War*, (Cambridge: Cambridge University Press, 1996), p. 285

5. The option of an accelerated process to complete the study no more than two weeks after an attack on Iran.

The first round of analysis was scheduled to take a week and was carried out in the form of a workshop (March workshop). Fifteen or so experts in varying fields from within the Defence Research Agency convened in mid-March 2007. During two days these experts discussed ten key topics of relevance to the project objective. The first two topics consisted of a discussion around the constructed attack scenario and Iran's possible reactions to an attack. The other eight covered consequences of an attack from regional, global and functional perspectives. The workshop was documented by a secretary and made into a written report (available from FOI).³ This workshop served as a benchmark for a possible accelerated work process in the event of an attack. It also served several other purposes, amongst which were:

- A more thorough understanding of the relevance of issues and questions. A useful input in the subsequent parts of the project.
- A critical examination of the method of drawing up scenarios and predictions about an uncertain future.
- A format that could also be used with decision-makers as an alternative way of dissemination if the need arose, i.e. in the event of an attack.

The possibility of an attack occurring was not the only risk associated with timing. As would be apparent during the course of 2007, U.S. policy focus coupled to the military option shifted from the nuclear installations to Iranian involvement in Iraq. This development arguably makes this final report less policy relevant. But the nuclear controversy with Iran will not go away any time soon and the military option will "remain on the table" as long as Iran is suspected of covert nuclear weapons development. And as Israel and the U.S. have declared that an Iranian nuclear weapons capability will not be allowed. A thorough analysis over time of the political focus and media speculation over attack planning against Iran is done in the concluding chapter.

³ Rydqvist et al.: *Consequences of Military Actions Against Iran*, Preliminary Report FOI (April, 2007)

Holistic undertakings and integrated analysis

The holistic nature of the core question of the study also needed to be addressed. It would have been impossible for one or two experts to cover the range of questions that needed to be addressed as part of the study. In fact, key expertise from a wide range of areas needed to be involved. For the March workshop a wide range of expertise was recruited from within the Defence Research Agency. Experts on military operations, energy, regional studies, terrorism and nuclear energy contributed their unique knowledge.

To expand on the multidisciplinary work already carried out in the project, a conference with international and domestic participation from a variety of disciplines was organised in October 2007 in the form of a panel discussion with an introductory speaker at the beginning of each session. In conjunction with this conference, a draft version of the report was reviewed by Gary Samore, Council of Foreign Relations, who took part in the conference. His comments and the discussions throughout the two days gave more constructive input to the project. Many of his comments and suggestions have been worked into this final report.

The dynamic of a holistic, multidisciplinary project such as this is a great asset. The integration of analysis across disciplines not only gives added value to the final written result, but at its best it also provides a creative working environment beneficial to all participants. In addition, an integrated work process and multidisciplinary analysis is beneficial to decision-makers, who are often forced or advised to look at the issue from a broad perspective.

A note on references and background facts

The preliminary April 2007 report issued as a result of the March 2007 workshop was a document in support of policy making. Timely and relevant assessment and dissemination was prioritized. To achieve this discussions amongst experts at the aforementioned March workshop were used as the baseline.⁴ Facts and assessments presented by the

⁴ The participants in the March 2007 workshop numbered approximately 15. All of them were affiliated with FOI and represented a wide range of knowledge and expertise. Amongst them were experts in military operations and air strike planning, energy security, terrorism and nuclear

participants were used as the empiric of the written analysis. The benefits of such a methodology are that a broad set of issues can be assessed in a short period of time. The drawback of course is that reliance on transcripts of communication and personal assessments increases the risk of faulty information and/or hasty judgements being included in the study. However this was mitigated by the fact that the preliminary report was an explorative work in progress neither aspiring to nor required to achieve high theoretical and academic rigour.

As described above, the next phase of the study involved examining strengths and weaknesses of the preliminary report text. This identified the need for complementary analysis and issues that had been left out either because of time constraints or because relevant experts were not part of the March workshop. The outcome of this analysis was a list of chapters and writers of chapters for the final report.

For the present report complementary chapters on the economy, environment, domestic consequences in Iran and aspects of international law were commissioned. Chapters that have been retained from the preliminary report have been checked for factual errors and most of them have been updated. However some of the chapters from the preliminary report, such as chapter two, have only been marginally altered and have not to any extent been provided with references. Thus individual chapters differ as to the amount of references attached to them.

Although factual errors have been corrected in these retained chapters, judgements and assessments made at the March 2007 seminar still provide the basis for some of the reasoning and logic of argument.

industry and proliferation as well as country and regional specialists dealing with Iran, Irak, the greater Middle East, Russia, EU, the U.S. and East Asia.

References

Dreborg, Karl Henrik: "Essence of Backcasting", *Futures*, Vol. 28, No. 9, pp. 813-28. (Oxford: Elsevier Ltd. 1996)

Herman, Michael: *Intelligence Power in Peace and War*. Cambridge: Cambridge University Press. 1996

Rydqvist, John; Lindvall, Fredrik and Zetterlund, Kristina: *Consequences of Military Actions Against Iran*. Preliminary Report FOI (07-635). Stockholm: FOI. 2007

Part 1: Setting the Stage – the US, Iran and the Attack Scenario

Chapter 1. United States: Drivers, Background and the Attack Scenario

Fredrik Lindvall

US grand strategy for the Middle East and policy concerns regarding Iran

During the presidency of George W. Bush, the US grand strategy for the Middle East has been to reshape the political landscape in order to curb or contain any negative trend or influence from that region. One defensive part of the strategy has been to withdraw most of the military forces from Saudi Arabia and instead distribute American troops to the smaller emirates in the region. This action has allowed for more flexibility and ended US reliance on one single non-democratic regional power. Another more offensive part of the strategy was to invade Iraq. The objective of that decision was to restrain Iraq's power in the Middle East, change its regime and put an end to a suspected programme of weapons of mass destruction (WMD).

Growing concern about Iranian power is widespread in Washington.⁵ US policy towards Tehran can be characterised as a strategy of pressure, using diplomatic, economic and military means.⁶ The more offensive objectives include encouraging human rights, facilitating democratic developments and sponsoring regime change. The more defensive objectives entail stopping the potential 'terror weapon-terrorist' nexus and containing Iranian regional power aspirations. The latter includes Iranian influence on developments in Iraq, especially the Iranian role in the security situation in Shia-dominated areas. In taking action to achieve

⁵ The current American administration's view on Tehran: "[US] may face no greater challenge from a single country than from Iran...", National Security Strategy, March 2006.

⁶ See Kenneth Katzman, *Iran: US Concerns and Policy Responses*, CRS Report RL32048, March 13 2007, p. 29ff.

these offensive and defensive objectives, military force could play a minor or major role.

The strategic purpose of a US military action against Iran or the potential tasks given to the regional US commander could be to destroy Iran's WMD programme, reduce Iran's influence in the region and/or change the regime in Tehran. Short of a large-scale ground invasion, all these aims could be hard to achieve or define in operational terms. To completely destroy Iranian WMD-related programmes without causing much strain on Iranian society would involve complex problems such as defining legitimate dual-use facilities. Even to verify regime change could prove difficult, due to the multipolar and complex power distribution in Tehran.

Any US military operation against Iran would need to consider different defensive measures to protect American interests in the region and globally. A primary concern for Washington is the security of the energy flow from the Gulf region. An example of a non-military action which could counter American and world market oil vulnerabilities would be to expand the US Strategic Petroleum Reserve.⁷ Another problem of the US is the exposure of regional allies to Iranian power. Tehran's hard military power, e.g. its SCUD missiles, and soft power, e.g. Iranian trans-border influence on Shiite communities, would require some protective actions. One of the main issues would be how to ensure a viable security situation in Iraq under and after an American attack on Iran.

In order to accomplish its objectives, the US has initiated a three-track policy:

1. *The multilateral process* entails putting pressure on Iran by using international organisations such as the IAEA or the so-called EU3 (comprising Britain, France and Germany). This process creates political momentum and helps Washington build a case for further actions should Iran not comply.
2. *The bilateral engagement* entails diplomatic action through bilateral talks with Iran and other actors etc.

⁷ In the US Energy Policy Act of 2005 the Secretary of Energy was directed to expand the Strategic Petroleum Reserve from 727 million barrels to a capacity of one billion barrels. Source: <http://www.fossil.energy.gov/programs/reserves/spr/expansion-eis.html>

3. *Military action* entails a wide range of activities, ranging from military show of force to military offensive operations.

Should the US decide to embark on military action, it would probably do this after having first fully exhausted the multilateral and bilateral track, not least in order to win over public support by showing that it has tried all other alternatives.

US strategic considerations and different options

If Washington decides to execute a military operation, its design will depend heavily on what end-state the president would want to achieve, and US assessments of Iran's possible courses of action.

If the objective were only to delay Iran's nuclear programme for a certain time, the targets could probably be met within a matter of hours. On the other hand, if the objective were more ambitious and were to involve e.g. containing Iran and reducing all of Tehran's regional military capabilities, the campaign might last for weeks. A more extensive end-state would also involve a larger number of target groups, such as a large part of Iran's combined air defence system and naval forces, the Islamic Revolutionary Guards Corps, and possibly economic targets.

There are also a lot of political-operational questions and dilemmas for the planners. When it comes to selecting targets, there is the delicate problem of finding the right facilities and nodes that are decisive for an Iranian nuclear arms programme. Facilities with direct links to nuclear technology would most likely be considered in all cases. With a more extensive objective, facilities with indirect connections to the nuclear programme and locations linked to delivery systems could be targeted. What is of key significance both in relation to whether an attack will take place and in the target selection process is what the US knows or believes to know about Iranian capabilities. Another constraining factor when selecting targets is the risk of collateral damage. The timing and duration of the attack would be crucial to how the general public, both in the US and internationally, would react.

The US would also have to consider the circumstances under which it could use different military bases in the region. During the first phase of the Iraq war of 2003 (Operation Iraqi Freedom), Saudi Arabia did not

allow American fighter aircrafts to fly attack sorties from its territory. However, military aircraft on other assignments were permitted to use bases in Saudi Arabia.⁸ This offered Saudi Arabia a way of reassuring both its citizens and allies. The US would probably be allowed the use of more or less the same bases and airspace as it was during 2003. Oman and the United Arab Emirates may impose more restrictions on the US because of their sensitivity with regard to Iran. As close small neighbours to Iran and with significant Shiite minorities, both countries have shown much restraint when it comes to challenging Tehran's interests. On the other hand, there would now be more opportunities to use Iraqi and Afghan territories given the US military presence there. By reinforcing US capabilities in smaller Gulf emirates in the beginning of 2007, Washington has countered potential Iranian threats against US allies and US military forces in the region.⁹

The US could choose one or more of the following actions as part of a military campaign:

- Initiate a conventional air campaign (most likely)
- Secure the Strait of Hormuz and its islands (likely)
- Carry out raids with Special Forces (likely)
- Economic blockade (likely)
- Fuel and support an insurgency in Iran (unlikely)
- Initiate a ground invasion (most unlikely)
- Use tactical nuclear weapons (most unlikely)

The prelude to military action would involve establishing a *casus belli*. Washington could justify warlike action in at least four ways. As in the Iraq case in 2003, the US could argue that Tehran is in 'material breach' of Iranian obligations under international resolutions, treaties etc. A second option would be to present a WMD-related 'smoking gun', which could point to the existence of undeclared facilities and an illegal WMD

⁸ See e.g. the 70th Air Refueling Squadron were stationed in Saudi Arabia, "Family waits for pilot to return" *Daily Republic* 2003-04-21

⁹ The new American Iraq strategy of 2007 included, among other things, posting one additional aircraft carrier and some Patriot missiles to the Gulf. None of the latter adds any significant capability to secure the streets of Baghdad, but are a noteworthy military gesture towards Iran.

programme. A third justification could be a 'smoking gun' connected to Iranian support for the insurgency in Iraq. The fourth argument is similar to the third. The US could argue that the use of military force is an act of 'self-defence', e.g. that an American attack is a legitimate response to Iranian military actions or provocations. In order to shore up support for these justifications, a strategic influence campaign would form part of US actions. By planting and breeding different lines of arguments concerning *casus belli* well ahead of an attack, Washington would be prepared to handle diverse situations and upcoming events. Independently of how things would work out, there would always be some other line of reasoning that could justify American actions in stepping up its pressure on Iran. If the multilateral track with the IAEA and UN comes to an unsatisfactory end or stand-still, the US could use the 'self-defence' argument if it thinks it needs a *casus belli*.

In the crosshairs - the nuclear programme and where to attack

If one wants to stop Iran by military means from getting nuclear weapons it is important to know where to attack. To find important nodes and bottlenecks, one needs to analyse the Iranian nuclear programme. By making a sketch of the known facilities and processes, e.g. those parts of the programme that have been under IAEA supervision, and adding processes and phases needed to get nuclear weapons, the potential Iranian nuclear weapons programme can be depicted. From that one can extract interesting targets. Every box in Figure 1 represents steps in the nuclear programme and potential facilities that could be targets.

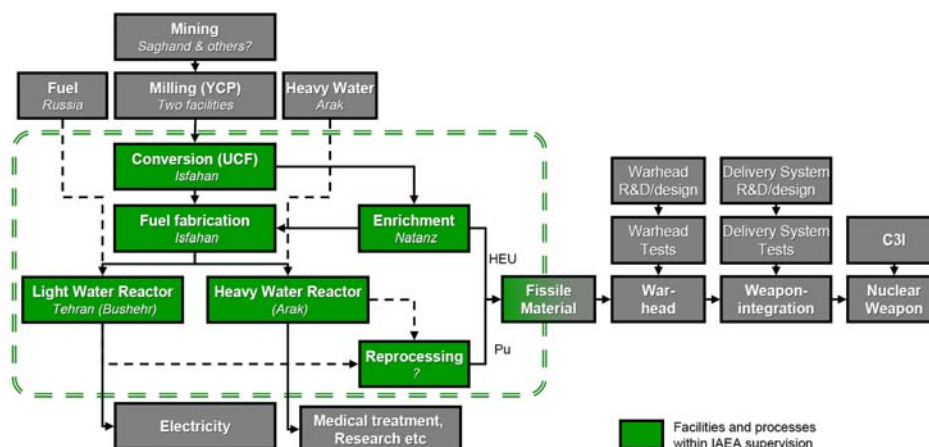


Figure 1: The potential Iranian nuclear weapons programme. Figure constructed in collaboration with Mattias Waldenvik

The attack - the strategic plan and the operational picture

This study identified a handful of facilities which, if attacked, could arguably delay the potential development of Iranian nuclear weapons for a few years. Different scenarios and operation plans (OPLAN) were considered. Every OPLAN has to strike a balance between objectives and constraints. This study analysed two distinctly different plans. One OPLAN is called 'Go Big'. This plan stipulates an attack on the full range of Iran's nuclear infrastructure. 'Go Big' will engage targets in both the uranium (HEU) and plutonium (Pu) paths as shown in figure 1 and take out as many nodes as possible. Targets would range from operational plants to construction sites coupled to the nuclear program. OPLAN Go Big would entail up to 20 nuclear cycle target sets with a stipulated timeframe of 48 to 60 hours. This timeframe only refers to the attack phase and accordingly does not involve any assessment with regard to possible military consequences. Most targets would be engaged by air strikes, using aircrafts and/or cruise missiles. Some sites near the Persian Gulf and the Caspian Sea, as well as Iran's borders with Iraq, Afghanistan and Azerbaijan, would be targeted by Special Forces. On top of that, the US would in this scenario carry out raids on Esfahan and/or Natanz by airborne ground forces. If the US would choose the Go Big plan, the

Iranian nuclear programme would probably be delayed by more than five years.

The other plan is called 'Go Fast' and entails fewer but more focused attacks, in a shorter timeframe, possibly in the range of 6-12 hours. This is a plan to engage critical nodes or choke points in the Iranian nuclear cycle. Again referring to figure 1 such critical nodes might be the Natanz enrichment plant or a future reprocessing plant. In this plan either the US has more information about the Iranian programme than is common knowledge and is therefore able to predict with great certainty key choke points and the value of destroying them. Or the US is prepared to take a greater risk when it comes to actually delaying the nuclear programme significantly. The element of surprise plays a notably prominent role in OPLAN Go Fast. One of the obvious benefits of a quick operation would be that the US could potentially forestall media coverage, and thus, to some extent, also international attention.

To support the strategic tasks, the US military OPLANs could have four phases (Figure 2). Phase I relates to the preparation and posturing of military assets, e.g. putting two carrier battle groups in theatre, supplying allies with Patriot Surface-to-Air-Missiles (SAMs) and putting additional ground troops into the region. Phase II focuses on supporting diplomatic activities, including a show of force, for example by conducting military exercises or aggressive reconnaissance. Phase III entails the military attack and includes two sub-phases (Figure 3). At the beginning of the attack, US forces must 'Shape the Battlespace', i.e. create a permissive environment for future actions, e.g. destroy key naval assets such as Iran's diesel-electric submarines, seize the Strait of Hormuz and suppress or destroy the Iranian integrated air-defence system (SEAD/DEAD IADS). For the Go Fast option the Shape the Battlespace sub-phase would be very limited, but for the Go Big option it would need to be distinct. The next part of the OPLANs would include 'Decisive Offensive Operations' consisting of a mix of e.g. air interdiction/strike operations, Special Forces operations and ground raids.¹⁰ The Go Big plan would entail about 600 air sorties, 200 cruise missiles and a dozen ground engagements in 48 to 60 hours. The Go Fast option could plausibly

¹⁰ Similar to the raid outside Kandahar the night of October 19/20 2001, when over 100 rangers were para-dropped, captured an airport and flew back by helicopters the same night.

consist of up to 200 offensive air sorties, 200 cruise missiles and no ground movements. Phase IV is the 'Follow-Up', where the military for example is prepared to conduct exercises and have assets on high alert in the vicinity of Iran. Depending on political developments, the US could for example establish no-fly-zones over Iran.

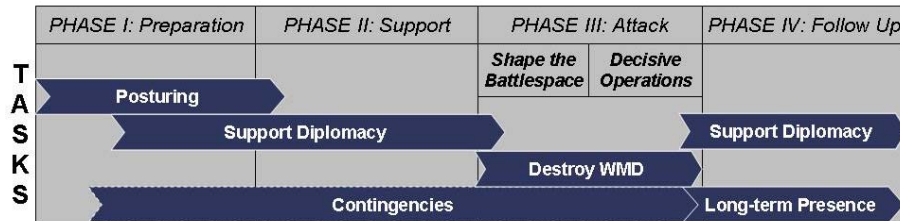


Figure 2: Phases and tasks in the military operation plan.

In parallel with Phases I-IV, there would be a strategic military contingency plan on how to handle up-coming and unforeseen developments. Trigger events could be naval incidents (such as the abduction of British seamen in 2007 or the Iranian raids against UAE oil rigs in 2006),¹¹ explicit Iranian involvement in Iraq, confirmed Iranian nuclear weapons, Iranian ballistic missile threats etc. The American response could entail one or more of the military missions listed above under Phase III and/or operations against the Iranian Revolutionary Guard Corp (IRGC) or possibly economic targets.

¹¹ "Iran Seizes 15 British Seamen - Capture in Gulf Seen as Reprisal At Sensitive Time", *Washington Post* 2007-03-24; Iran attacks Romanian oil rig, *BBC* 2006-08-22

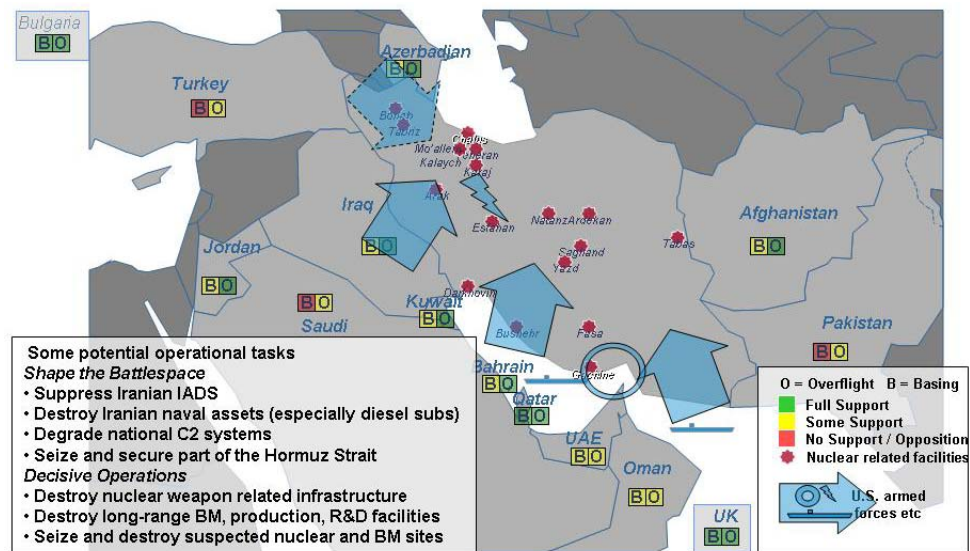


Figure 3: The operational picture with potential tasks.

The prelude to an attack – early warning indicators

One recent event could be seen as annihilating US military options against the Iranian nuclear programme. In December 2007 the National Director of Intelligence publicised part of the conclusions of the National Intelligence Estimate (NIE) on Iran's nuclear programme.¹² It was seen by many commentators and politicians as seriously undermining any argument for conducting an attack or even threatening to attack Iran. After the NIE statement, should no new information emerge, it would certainly be very difficult for the US to get the political momentum and support needed to legitimise a military attack. On the other hand, the NIE convinced the world that Iran has a nuclear weapons programme, a previously controversial topic. It also noted that new information (of course) could change the threat assessment¹³

There are pointers on the global political arena which could offer clues as to when a military action could be initiated. One indicator could be when

¹² December 3, 2007: Statement by the Principal Deputy Director of National Intelligence on NIE Key Judgments

¹³ Henry Kissinger, "Misreading the Iran Report," *Washington Post*, December 13, 2007, p. 35

the multilateral, diplomatic instrument is considered to have been exhausted. Developments in individual countries could also have some bearing on political decisions. The British Prime Minister, Gordon Brown, appears to be trying to set a different tone in UK-US relations than his predecessor, Tony Blair. One example is Prime Minister Brown's emphasis on UK independence in deciding its military involvement in Iraq. This could mean that the UK would be more likely to adopt an independent stance with regard to Iran or, on the contrary, that Brown would feel a need to be more compliant toward President Bush in order to reconcile relations with Washington. Likewise, since French President Jacques Chirac left office in the summer of 2007, there have been new signals coming out of Paris. However, it is still unclear whether recent statements of potentially tougher actions against Tehran represent a substantive shift in policy. For the current US administration, the American engagement in Iraq is its principal security policy issue. It now looks likely that the major military involvement in Iraq will be extended into the next presidency. Iraq will be an important part of the Washington agenda for years to come, but this should not exclude the possibility of a military attack on Iran.

The past two years have seen many signs of an American political escalation against Iran. In the beginning of 2006 the US administration decided to allocate USD 75 million to support democracy in Iran, thus inspiring regime change. There have been British and US accusations of Iranian-made improvised explosive devices (IEDs) in Iraq, and in February 2007 the US military presented what it claimed were Iranian-made bombs and explosives found in Iraq. Meanwhile, there have been reports in the media that Iran is supporting insurgency groups in Baluchistan. Simultaneously, reports of US support to the militant group Mujahedeen-e-Khalq (MEK) in Iran have appeared. It has also been claimed that US Special Forces have conducted operations in Iran. A second US aircraft carrier was sent to the Gulf Region in xxxx. The January 2007 surge with some 21,500 additional combat troops being sent to Iraq, together with Patriot SAMs for the Gulf emirates, are other signs. At the end of summer 2007, entities within the IRGC were placed on the US State Department's list of terrorist organisations.

Numerous events in the past year could be connected to a forthcoming US military attack. The Pentagon has announced that it will send more troops to Afghanistan (one brigade) and, in addition to the above-mentioned surge, some 3,000 military police to Iraq. Bulgarian news articles in February 2007 claimed that B-2 bombers could now operate from Bulgarian airbases on route to or from attacks in Iran. At the same time the British Royal Navy has reportedly sent mine-hunting vessels accompanied by US warships to the Gulf region. Other indicators include a couple F-117 stealth fighters having been flown to South Korea in January 2007. The announcements of unusual aircraft or bombers in Korea or Guam have in the past been a signal to Pyongyang to stay calm when the US is to initiate political or military actions. Future indicators that may occur before an attack include aircraft carriers departing from the continental US, delivery of Patriot SAMs to Israel, border preparations (in Iraq and/or Afghanistan), forward positioning of air-to-air refuelling assets or special forces transport helicopters etc.

Success or failure – how the American attack would be perceived

The question of whether an American attack on Iran would be perceived as a failure or success can be answered from at least three perspectives in corollary to how the use of force is generally judged today (Figure 4). Perspective 1 has more of a military connection and is concerned with whether the military plan was adequate and whether the military operation was well executed. Typical problems include neglecting practical conditions or potential accidents when planning missions.¹⁴ Although there are always risks in military activities, a fair guess is that an attack would probably not be perceived as a failure from Perspective 1. If one looks at recent US military experience and current capabilities there is a reasonable chance of success.

Perspective 2 concerns whether the direct goal was achieved. If the objective of the attack was to delay a potential Iranian nuclear weapons programme, key factors would be available intelligence and the *de facto*

¹⁴ An example is the American operation to rescue the embassy hostages in Iran 1980 (Operation Eagle Claw)

state of the nuclear programme. Lack of intelligence could be compensated for by more extensive attacks, but the more military offensive measures, the more political risks.

Perspective 3 concerns whether the overall political ambition is met. Typical aspects of this kind are the long-term impact on security in the Middle East and American security interests, and also the US reputation and influence in other parts of the world. Key factors for failure and success from Perspectives 2 and 3 are the framing and specific political conditions surrounding an attack, but also the impact on and the response of the Iranian national decision-making apparatus. If the US managed to get some sort of international consent, before or after an attack, and the direct objective seemed to be in line with the political ambition, then the attack would have a chance of avoiding being perceived as a failure. The limited Go Fast OPLAN, with the stated objective of delaying the Iranian nuclear weapons potential and supported by good intelligence, possibly revealing former undisclosed parts of the nuclear programme, would have the best chance of being perceived as a success. Perspectives on whether the overall goals and objectives were met and how U.S. grand strategy and policy is affected are more complicated and would probably be the main focus of politicians and the general public.

<i>Perspective</i>	<i>Success</i>	<i>Failure</i>
1 Military (plans & execution)	Probable (experience & capabilities)	Unlikely (neglect & accident)
2 Direct objective	Uncertain (intelligence, confined or extensive attacks)	
3 Political ambition	Uncertain (timing, incoherent or extensive ambition)	

Success or failure from three different perspectives, and with important factors in parentheses.

Figure 4: Perceptions and perspectives on success or failure of military operations.

References

BBC (*British Broadcasting Corporation*). "Iran 'attacks Romanian oil rig". BBC News, August 22, 2006. URL: <http://news.bbc.co.uk/go/pr/fr/-/2/hi/europe/5274374.stm>

Daily Republic: "Family waits for pilot to return", April 21, 2003. Fairfield: McNaughton Newspapers

Katzman, Kenneth: *Iran: US Concerns and Policy Responses*, CRS Report RL32048, March 13, 2007. Washington D.C.: Congressional Research Service

Kerr, Donald M. (Principal Deputy Director of National Intelligence). Statement by the *Principal Deputy Director of National Intelligence* on NIE Key Judgments, December 3, 2007. Washington D.C.: Office of the Director of National Intelligence

Kissinger, Henry: "Misreading the Iran Report", *Washington Post*, December 13, 2007. Washington D.C.: The Washington Post Company Ltd

National Security Strategy of the United States of America, March 2006. Washington D.C.: The White House

US Energy Policy Act of 2005. URL: <http://www.fossil.energy.gov/programs/reserves/spr/expansion-eis.html>

Washington Post: "Iran Seizes 15 British Seamen - Capture in Gulf Seen as Reprisal at Sensitive Time", Mars 24, 2007. Washington D.C.: The Washington Post Company Ltd

Chapter 2. Iran: Strategic and Military Posture

Emma Sandström

Iran's Strategic Posture

Iran is primarily a regional power with few allies. Iran thus harbours serious and arguably legitimate security concerns. These concerns are key to understanding Iran's foreign policy, perceived military build-up and harsh diplomacy. Tehran is not expected to find significant military support from any allied country in the case of an attack against its nuclear infrastructure. The main objectives of Tehran are for its regime to survive, to strengthen its international negotiation position and to build a regional power position, including through deterrence. Iran wishes to expand its sphere of influence but there are few, if any, signs that it aims to expand territorially. Thus, its strategic posture can be interpreted as a means to deter an attack on Iran and its national interests.

Iran's Military Posture and Capabilities

Assessments of the size of the Iranian armed forces vary. In the IISS Military Balance 2008, the total number of troops in the three traditional services is put at 420,000 while 125,000 are estimated to form the Revolutionary Guard Corps and another 40,000-2.5 million the paramilitary formations.¹⁵ The majority of troops are conscripts. Arms and equipment are judged to be largely outmoded and the overall command and control system is dated. Although Iran's air force and air defences to some degree have been upgraded, notably with the purchase of Russian TOR-M1 (SA-15) and S-300 medium and long range air defence systems, these are not expected to affect the overall ability of the US to carry out air operations against Iran.^{16,17} However, in the event of an Israeli attack against Iran, the TOR-M1 systems could cause difficulties. Iran's military posture is defensive and the armed forces are

¹⁵ The Military Balance 2008, (London:IISS, February 2008), p. 242

¹⁶ Doug Richardson: "Iran may have lined up S-300 SAM systems", *Janes Missiles and Rockets*, 9 January (2008)

¹⁷ Lionel Beehner: Russia-Iran Arms Trade, Council on Foreign Relations, November 1, (2006)
URL: <http://www.cfr.org/publication/11869/>, accessed 080411

not expected to be able to conduct large-scale offensives outside Iran. The notable exception is Tehran's arsenal of ballistic missiles (Shahab-3), which could be used against Israel or other regional targets.

In addition to the 420,000 strong regular armed forces, Iran's Islamic Revolutionary Guards Corps has some 125,000-200,000 personnel in four branches: the Qods Force (Special Forces), the Navy, the Air Force and the Ground Forces. These are better trained and have better equipment than the regular forces. These forces are tasked with, among other things, guarding nuclear facilities. Iran's navy has to a limited extent been upgraded since the Iran-Iraq war and coordination with other military branches has been initiated. It is unclear what state Iran's submarine fleet is in and whether it can pose any problems to the US in the event of an attack. In addition, Iranian sea mines and shore-to-sea missiles could possibly be of concern. Shore-to-sea missiles could also mean that US forces would need to land on the shores in order to eliminate the threat. The Basij Resistance Force (Paramilitary) is thought to be able to mobilise around 1 million combat-capable conscripts in times of great need. Iran claims this organisation has in excess of 12 million members.¹⁸

To conclude, the US would not be expected to have any problems with incapacitating Iran's air defences and air force. Therefore an air campaign does not present a great military challenge to the US. A massive military land-invasion is not seen as a viable US option, but special operation forces would probably be used to some extent. Iran could choose to launch missiles, e.g. against Israel, in order to create chaos. Preventing such attacks would present a far greater challenge to the US.

Nuclear Issues

A nuclear weapon is composed of a nuclear device and a delivery system. In order to construct a nuclear weapon, a country must have access to fissile material, a design for the nuclear charge and the ability to conduct non-nuclear design verification tests at various stages of development. Once constructed, the nuclear charge is integrated with a delivery system. Ultimately, a posture, doctrine or idea of who gets to use the weapon and

¹⁸ The Military Balance 2008, (London:IISS, February 2008), p. 244

how must be implemented. The top political level usually likes to keep firm control over such strategic weapon systems. The challenge is to create a robust and functioning system for Command, Control, Communications and Intelligence (C3I) which ensures strict political control while at the same time making use of the weapons possible even under conditions of war.

Based on open source information, Iran has the following known facilities connected with the various stages of a nuclear arms programme:

- Uranium mines: *Two mines are often mentioned, Saghand and Gchine.*
- Yellowcake production facilities: *Two – one in Ardakan and one near Gchine.*
- Uranium conversion facilities: *One, outside Isfahan*
- Enrichment: *One, outside Natanz*
- Fuel factories: *One, outside Isfahan*
- Reactors: *Of particular interest is arguably a heavy water moderated reactor under construction in Arak. The light water reactor being constructed at Bushehr and the old operational research reactor in central Tehran are deemed of less proliferation concern.*

Thus, Iran is in the process of acquiring all parts of the civilian nuclear cycle domestically.

The International Atomic Energy Agency (IAEA) is authorised to only monitor the uranium conversion, fuel production and reactor process to produce plutonium, as well as the enrichment process to produce enriched uranium. The IAEA only has access to the fissile material phase if it is part of a civilian programme.¹⁹

An Iranian capacity for producing weapons-grade plutonium is still far off. The light water reactor being built in Bushehr will not be suitable for plutonium production and therefore presents less of a proliferation risk even after it becomes operational, compared with the Arak facility.

¹⁹ See Figure 1 in Chapter 1

The heavy water reactor being built at Arak is arguably more worrying. It is likely that Iran has the know-how to go down the plutonium track. It is not known though how quickly Iran would be able to produce sufficient amounts of fissile material for a nuclear weapon.

In order to ensure that an attack has maximum effect on Iran's ability to acquire nuclear weapons, bottle-necks or targets that are particularly difficult to rebuild would have to be identified. Possible facilities to target in a military operation could include the fuel enrichment programme in Natanz where Iran is installing ever more centrifuges. The construction of Arak, on the contrary, is not expected to be finished until 2010-11. It can be noted that it would be relatively easy for Iran to hide enrichment facilities, especially given its topography.

As regards weapons delivery systems, Iran is assumed to have already reached the phase of being able to carry nuclear arms. Thus, these weapons and related infrastructure could present an important target. In the event of an attack, it is conceivable that the US would try to target Iranian missiles. The estimated time for raising and fuelling a missile before launch is about 30 minutes. Apart from the apparent need to go after operational missiles, it might also be efficient to hit facilities for missile production and testing. There are numerous such facilities in Iran, especially in the northern part of the country. However, it is uncertain whether conclusive intelligence on all missile production facilities can be collected. Test sites are easier to detect but would perhaps be of less importance to eliminate.

Little is known about Iran's research, design and testing of nuclear arms. The fact that such activities only require limited space and few people makes it rather difficult to uncover information. However, it can be noted that Iran has reached a relatively advanced stage in corresponding activities related to conventional weapons. It is also conceivable that Iran's space programme offers an alternative way of testing whether delivery systems are able to cope with the charges.

Aerial attacks against Iran's nuclear facilities would not be expected to result in large collateral damage. The research reactor in Tehran is not judged to be of great importance to any WMD programme and would

hence not be a likely target. A military operation against Iranian nuclear facilities would probably result in minimal, if any, radiation leakage.²⁰

Issues Related to Biological and Chemical Arms

Iran is party to the Biological and Toxin Weapons Convention (BTWC) and the Chemical Weapons Convention (CWC). There are no substantial indicators of Iran currently producing either chemical or biological weapons (CBW). There are a number of research establishments affiliated to the Ministry of Defence that work with CBW relevant dual-use research, of which five have been declared to the Organisation for the Prohibition of Chemical Weapons (OPCW). During the 1980s Iran did have a limited programme, which comprised the production of mustard gas, phosgene and later probably nerve gas on a small scale. A direct incentive for the programme was Iraq's use of chemical weapons (CW) during the Iran-Iraq war and its extensive offensive nuclear, biological and chemical (NBC) weapons programme, which remained a potential threat up until 2003. Iran has declared to the OPCW that the limited amount of mustard gas produced in the late 1980s has been destroyed and the related facilities have been converted. If Iran still has any amount of nerve gas from the former offensive programme, this would be degraded and not usable today. However, if they developed binary sarin warfare agents in the same manner as Iraq did, these would still be functional.²¹

The incentives for Iran to have biological and/or chemical weapons are probably limited, primarily as there are currently few apparent scenarios under which they could be used. In addition, CBW arguably do not affect a country's international standing in the same way as would the possession of nuclear weapons. Similarly, it is not considered likely that any other country would use CBW in the event of a US attack against Iran. Syria is believed to have an extensive CW arsenal, while Egypt possibly has remnants from an older CW programme it ran in the 1970s. A more likely development in connection with a US attack would be for Tehran to use proxies to employ CW as a weapon of terror in Iraq or

²⁰ See Chapter 9

²¹ Organisation for Prohibition of Chemical Weapons

northern Israel. It can be added that chlorine has been used in repeated attacks in Iraq, but that these attacks so far have been rudimentary. It could arguably be seen to be in Iran's interests to lie low and not offer the US any reason to attack. But if Iran foresees an imminent US military intervention, Tehran would probably aim to complicate such an attack by broadening the conflict dynamics to other areas and actors in the region.

The possibility that a US attack could trigger an offensive programme cannot be ruled out. Iran is not believed to have a rigid moral standpoint against biological and chemical arms and has already historically crossed the line by starting production of CW some 20 years ago. Iran's declaration of its former CBW programme and current capabilities has been internationally questioned. Iran has the ability to mobilise production of biological and chemical weapons by redirecting its legal activities connected with the production of pesticides, pharmaceuticals, vaccines, etc.

References

The Military Balance 2008, (London:IISS, February 2008)

Doug Richardson: "Iran may have lined up S-300 SAM systems", *Janes Missiles and Rockets*, 9 January (2008)

Lionel Beehner: Russia-Iran Arms Trade, Council on Foreign Relations, November 1, (2006)

URL: <http://www.cfr.org/publication/11869/>, accessed 080411

Part 2 : Consequences – Regional Contexts

Chapter 3. Security Policy Consequences for the Gulf region

Firas S. Hassan, Magnus Normark, Magnus Norell

The Gulf region has a long history of many and complex conflicts - between ethnic and sectarian groups, as well as between states within and outside the region. Added to this are the vital interests that a large number of powerful external states and actors have in the region. Assessing possible consequences in the region, should the United States see the use of force as the only viable option to address the Iranian nuclear dilemma, is indeed a difficult and complex task. Consequently, this assessment is limited to some of the actors and aspects deemed to be of high relevance in such a scenario, including an Iranian response and potential room for manoeuvre, the perspective of the Gulf Cooperation Council (GCC) and Israel, the reactions of various actors in Iraq, and potential implications for the Iranian-Syrian alliance.

Iranian potential actions and reactions

There are several factors contributing to the impression that Iran has strengthened its regional position during the past decade. Among these is the Iranian nuclear standoff, which is increasing the perceived threat and highlighting the difficulties for the international community in addressing it. Iran has also emerged as an actor in Iraq where Shiite influence is growing and violence between Shiite and Sunni groups has shown an escalating trend in the period 2003-2006. Reports also point to Iranian influence in the insurgency against US coalition forces.

The year 2007 nevertheless saw a reduction in violence in Iraq. It is debatable whether this is a consequence of the US surge in troop numbers, the new strategy of isolating al-Qaeda elements by engaging domestic Sunni militant factions, or diminished Iranian sponsorship and support to Shiite militias. It is evident, however, that Iran wields a great

deal of influence over Iraq's stability and is one of the key actors in the political solution for the latter.

The improved standing of Hezbollah in Lebanon *vis-à-vis* Israel as a result of the war in the summer of 2006 and the destabilised Lebanese government has also contributed to a changed perception of Iran's position in the region. Added to this picture are the signs of a weakened Arab coalition, the precarious US position in Iraq and its somewhat tarnished standing in the international arena, as well as the inability of Western states to form a strong coalition to handle the standoff with Iran. Resentment in the Arab world has also negatively impacted on US attempts to rally Arab governments behind a containment policy towards Iran.

Moreover, Iranian officials do not hesitate to use deterrent rhetoric when the topic of a possible US military attack against Iranian nuclear sites is brought up. Speaking to a gathering of Iranian air force commanders in February 2007, Supreme Leader Ayatollah Ali Khamenei said: "The enemy knows well that any invasion would be followed by a comprehensive reaction to the invaders and their interests all over the world."²² Another example of such deterrent rhetoric is Admiral Ali Shamkhani, a senior defence advisor to the Supreme Leader, warning that Gulf States providing the US with military cooperation would be key targets of a barrage of ballistic missiles. Shamkhani told the US journal *Defense News* that missiles would be launched not only at US military bases but also at strategic targets such as oil refineries and power stations.²³ Other Iranian officials have claimed that Iranian missiles would be launched within an hour of a US attack and would be accompanied by increased support for terrorist groups, stating that "...the US will be as surprised with Iranian military capabilities as the Israelis were with Hezbollah in last summer's war in Lebanon,"²⁴

²² "Iran Warns US it Will Retaliate if Struck", *The Associated Press*, February 8, 2007.

²³ "Iran Threatens Gulf Blitz if US hits Nuclear Plants" *The Sunday Times*, June 10, 2007.

²⁴ Ibid

Diplomacy and the proliferation dilemma

There are few indicators of success and a lack of historical support for pre-emptive attacks launched in order to prevent offensive state ambitions to develop weapons of mass destruction. The Osirak reactor in Iraq, and the Israeli bombing of it, is but one example illustrating the difficulties of addressing policies or means which a regime perceives to be of vital strategic interests to the country's security and development. After the attack on Osirak, Saddam Hussein only boosted Iraqi efforts to build WMD capabilities. Similarly, it seems probable that Iranian ambitions to rebuild a comprehensive autonomous nuclear industry would be strengthened following a US attack. The Iranian regime would in all probability make itself out to be a victim of military aggression and see itself justified in withdrawing from the Nuclear Non-Proliferation Treaty (NPT). This, in turn, would allow Tehran to pursue a covert offensive nuclear capability, using the capacity and know-how assembled during recent decades, without the inconvenience of inspections by the International Atomic Energy Agency.²⁵

Such a development would escalate the risk of a nuclear arms race in the region. An isolated but self-sustained Iran, boosting its efforts to develop a nuclear weapons capability and with a more aggressive political leader devoted to enhancing Iran's regional influence by establishing a strong Shia axis, would undoubtedly trigger some of the Arab states to embark on the nuclear weapons pathway. An Iranian withdrawal from the NPT and the US opting to use military force to address the Iranian nuclear dilemma without the backing of an international mandate would bring an already weak NPT to the grave. This would further weaken the international community's possibilities to counter destabilising developments in the region and the proliferation dilemma globally. King Abdullah of Jordan stated in January 2007 that Jordan is seeking nuclear capability and that "...after this summer everybody is going for nuclear programmes", referring to the growing concerns of the Iranian nuclear dilemma.²⁶ Other countries in the region allegedly exploring the

²⁵ Salama S. and Ruster K, *A Preemptive Attack on Iran's Nuclear Facilities: Possible Consequences*, Center for Nonproliferation Studies, Monterey Institute of International Studies, September 2004.

²⁶ "King Abdullah Says Jordan Seeks Nuclear Programme", *Reuters*, January 19, 2007. URL: <http://www.reuters.com/article/latestCrisis/idUSL19358696>

possibility of acquiring nuclear capability include Egypt, Saudi Arabia and Syria.²⁷ A nuclear arms race in the Middle East would destabilise the region. The regional balance of power would be altered and Israel would feel compelled to adapt its security policy to meet a new regional context where some of the Arab states might become future threats to its existence. Despite current peace agreements, a nuclear arms race in combination with a destabilised situation in the region with an imminent risk of sectarian struggles spreading to states such as Jordan, Egypt and Saudi Arabia represents a very potent security dilemma for the Israeli security strategists.

Iran is not believed to expect a ground war. The most likely course of action for the regular Iranian army is judged to be the dispersal of men and resources, including missiles, so as to ensure survival of military capability. There is a chance that the US views this as an opportunity to conduct ground operations. Despite this, this report considers the probability of a ground invasion to be very low. US forces are already stretched thin and the geographical setting is not seen as favourable.

Potential military retaliation and counter-strikes

In the event of a military operation Iran could choose various military responses. Amongst those discussed are:

- 1. Target US forces in Iraq (by conventional means via allied groups).**
- 2. Target US interests in other countries (via allied groups in e.g. Afghanistan).**
- 3. Defend itself, using mainly the Islamic Revolutionary Guards Corps.**
- 4. Use Scud missiles against Israel.**
- 5. Hit economic targets by e.g. targeting oil installations or exports.**

²⁷ See for example "Nukes in the Balance – The Effects of Proliferation on Regional Security", *Jane's Intelligence Review*, July 1, 2007.

Option 1 is deemed to be the most likely and easiest option for Iran to carry out. However it is not evident what the effects of such a course of action would be. Iran's ability to further destabilise the situation in Iraq is not clear, and it is uncertain how long Iran would be able to sustain such activities. Iran is judged to already have tested the option of targeting Iraq via proxies but it is uncertain to what extent Iran has and can influence groups and developments in its neighbouring country. In addition, Iran is not likely to want to create chaos along its own borders, which could also spread to Iran, and would therefore want to keep instability within limits. Instability in Iraq, caused by Iran, would probably not be welcomed by Shiite religious leader Ayatollah Sistani either. The risk of any instability spreading to Iran is probably one of the reasons why Supreme Leader Ayatollah Ali Khamenei has tried to hold back the President. However, Iran is assumed to be able to use groups in the region that share common interests with Iran. Foremost, Iran would be able to bring into play proxies in Iraq in order to cause problems for the US and its troops. Iran's own Qods Force could perhaps also act in Iraq. Other feasible groups could perhaps include insurgency groups in Afghanistan, possibly Hezbollah, and groups on the West Bank. As it is unlikely that Iran would benefit from instability too close to its own borders, there is the possibility that Iran would rather choose to increase support to groups like Hezbollah which operate further away.

The possibility cannot be ruled out that the US has already decided to counter such a course of action by its military surge in Iraq with additional troops. Simultaneously, Britain's decision to pull out of the southern, and mainly Shiite, part of Iraq could possibly be interpreted as a partial pullback in anticipation of a worsening security situation.

While Iranian leaders have been reported to be trying to prepare Iranians for sanctions, it can be added that social discontent in the country is judged to be considerable. Furthermore, Iranian leaders seem to differ as to what course of action Iran should take. The highest authority is not President Ahmadinejad, but rather Supreme Leader Ayatollah Ali Khamenei. In addition, there is not one, but several, Shiite leaders people listen to and follow. Ayatollah Sistani in Iraq also has considerable influence among Shiite Muslims in Iran.

Possible developments/responses in Iran after an attack:

1. Revolution, leading to reconciliation and Iran approaching the West.
2. Absorption, whereby Iran reacts to an attack by sitting on its hands.
3. Total war.

It is plausible that Iran would gain in terms of international reputation and status by doing nothing in the face of an attack, portraying itself as the victim. Should Iran choose the third option of total war, it is unclear how many of the Shiite Muslims in Iraq would support Iran. Ayatollah Sistani's opinion would most likely carry considerable weight.

Effects of a military attack on the Iranian WMD programme are dubious. Outcomes can be any of the following depending on the extent of a possible hidden program:

1. The WMD programme ends.
2. Program is stalled/delayed for years
3. The WMD programme is left unaffected.
4. The WMD programme accelerates (crash programme).

The Iranian 'oil-weapon'

Iran is one of the world's largest oil producers and holds the fourth largest proven oil reserves. Oil and gas exports and the import of refined oil products represent the nerve centre of Iran's economy and any conflict erupting would be bound to influence such imports-exports. It should be noted that Iranian oil production decreased by one-third between 1974 and 2005 while domestic energy demand steadily increased. According to the International Energy Agency's (IEA) World Energy Outlook, Iran's primary energy demand will increase by 3.4% per year between 2003 and 2010 while the demand for transport fuel will rise by 3.1% and that for electricity generation by 4.9% per year.²⁸ Iran's dependence on refined products such as petrol is estimated to increase by approximately 9% per

²⁸ IEA, *World Energy Outlook 2005, Middle East and North Africa Insights*, OECD/IEA, Paris, 2005, p. 568.

year. For example, Iran imports 60% of its petrol from Europe and 15% from India. Despite plans to invest large sums in its refinery capacity over the coming decades, total demand and consumption of refined products are expected to increase at a higher rate than domestic production.²⁹ China and Japan are two of the most important importers of Iranian oil.

There have been frequent threats from Iranian officials to turn Iran's oil industry and strategic position in the Gulf region into a weapon, pending further pressure from the West. Iran could not only halt its oil deliveries of crude oil, which amounts to 2.5 million barrels per day (BPD), but possibly also disrupt all oil supplies going through the Strait of Hormuz. This would have devastating effects on the international oil market and the international economy as a whole. Crude reserves in industrialised countries would not last for long and the surplus capacity of other oil-producing countries is limited and probably not sufficient to compensate for disruption of Iranian oil exports. However, given Iran's dependence on revenues from oil exports and on imports of refined products, using the 'oil weapon' would be catastrophic for Iran itself. In the same line of thinking, the Iranian economy is thus equally vulnerable to international sanctions targeting Iranian imports of refined oil products and/or oil exports. Sanction proposals through the United Nations Security Council would most likely be vetoed by China, whose ties with Iran have strengthened. China is a growing oil consumer which during the first four months of 2007 increased its import of crude oil from Iran by 14%.³⁰ Iran is boosting its relations with Asian countries with growing energy demand and has signed several deals with Asian countries for the export of oil and natural gas and the construction of refineries.³¹

In sum, the oil weapon is not a likely choice for the Iranian regime to counter a limited US attack against nuclear installations due to its extremely costly effects on the Iranian economy. Even a partial restriction on Iranian oil and gas exports, and for a limited period of time, would not serve Iran's interests due to the ability of the international market to temporarily compensate through surplus capacities and reserves.

²⁹ Cordesman A., Al-Rohan K., *Iranian Nuclear Weapons? Options for Sanctions and Military Strikes*, CSIS, Working draft, Revised version: August 30, 2006.

³⁰ See "Iran biggest crude oil supplier to China", *The Standard*, March 02, 2007 and "Iran to build five new oil refineries across Asia", *AFX Asia*, June 11, 2007.

³¹ Ibid

However, a possible Iranian retaliatory measure would be the selective disruption of oil deliveries through the Strait of Hormuz.

Actions and retaliation through proxy warfare

Other probable reactions from Iran in connection with a US attack on Iranian nuclear facilities would be to increase and broaden the use of asymmetric warfare through proxies in the region. Likely targets for such attacks would be US troops and installations, for example in Iraq and Afghanistan. Sustained Iranian efforts to destabilise Iraq could potentially be effective. There are arguably considerable incentives for Iran to try to influence developments in Iraq. It would be in Iran's interests to support Shiite domination in Iraqi politics, to make the US engagement and presence in Iraq as difficult as possible and to demonstrate Iran's stature as a regional power that needs to be included in efforts to stabilise Iraq and the region. The US has recently declared its growing concern over Iranian influence in Iraq. According to a briefing by the US military spokesman in Iraq on July 2, 2007, Qods Force operatives of the Iranian Revolutionary Guards Corps have supported Shiite militants in Iraq with training, weapons and funding through Hezbollah.³² The US had for a long time suspected that Iranian forces had supported militants in Iraq but the July 2 briefing was more specific in stating that Qods operatives had assisted militants in planning operations against US troops. Furthermore, it was stated that top officials of the Iranian regime had had advance knowledge of specific deadly attacks against US soldiers. The assessment was made on information primarily acquired from interrogations of two captured individuals in Iraq – Shiite militant Qais Khazali and the senior Hezbollah operative Ali Musa Daqduq.³³ The US has escalated its confrontational stand against Iran by declaring the Iranian Revolutionary Guard a global terrorist organisation and targeting its extensive financial interests.³⁴ In September 2007, Iran's Supreme Leader announced a newly appointed head of the revolutionary Guard to replace General Yahya Rahim Safavi, who had led the Guards

³² Brig. Gen. Kevin Bergner, Multi-National Force – Iraq Press Briefing July 2, 2007. URL: http://www.mnf-iraq.com/index.php?option=com_content&task=view&id=12641&Itemid=131

³³ Ibid

³⁴ MacAskill Ewen, "Iranian guards are terrorists, US to declare", *Guardian*, August 16, 2007.

for a decade. The reason for the change was not clear but the announcement came only two weeks after General Safavi's declaration to the press that the Revolutionary Guards "...will never remain silent in the face of US pressure and we will use our leverage against them."³⁵ .

Using proxies in order to broaden the scope of conflict in the region is, as mentioned above, a possible scenario. Israeli targets may come into play through asymmetric warfare from northern Lebanon or the Palestinian territories. Iran's clerical leadership supported the foundation of Hezbollah in Lebanon in the 1980s and Iran's Supreme Leader is the main source of inspiration for the group. Furthermore, Iran continues to provide the group with funding, weapons and training. Hence Hezbollah, with its status as a powerful actor in Lebanon and with military capabilities that include rockets that can reach Israeli cities, constitutes a powerful tool for Tehran. However, Hezbollah is by no means an Iranian pawn. The organisation has its own interests to consider, especially in the Lebanese political arena. In addition, Damascus also has some influence on Hezbollah.

Hitting targets abroad through proxies would be less risky for the Iranian regime, should they decide to launch retaliatory attacks against US targets and interests. Iran's ability to strike through Iranian-supported terror groups was demonstrated by the attacks against the Israeli embassy and Jewish community centre in Buenos Aires in 1992 and 1994. No-one has ever been convicted for the attacks but the general assessment amongst security experts and the Argentinian government is that the attacks were ordered by Iran and carried out by Hezbollah.³⁶

Iran's relationship with Hamas is more difficult to assess. This is partly due to the differences between the Sunni movement and the Shiite government and partly to internal divisions within Hamas between the more radical and hard-line political leadership in exile and the relatively more pragmatic and flexible one in Gaza. In the past, Hamas has been dedicated to limiting its connections with Iran and its reliance on financial aid from Tehran. However, the international isolation of Hamas and its conflict with Fatah since the organisation's rise to power have

³⁵ "Iran replaces Revolutionary Guard Chief", *The New York Times*, September 1, 2007.

³⁶ "Iran charged over Argentina bomb", *BBC News*, October 25, 2006.

increased the Hamas dependence on Iran. Hamas recently declared its close relationship with Iran and during Ismail Haniyeh's visit to Iran, in December 2006, the Hamas leader stated that Iran constitutes the strategic depth of Hamas.³⁷ Iran's influence in Hamas is growing. After the 2006 election and the following isolation of Hamas, Iran pledged substantial financial support to the Palestinian movement. Furthermore, there are allegations of Iranian support to Hamas and other Palestinian groups in terms of training and weapons, both directly and through Hezbollah.³⁸

In sum, even a successfully selective and relatively quick US attack on Iranian nuclear facilities could have various adverse effects on US interests in the Middle East and the world. After the US National Intelligence Estimate (NIE) which was released in late 2007 and which concluded that Iran had ceased its nuclear weapons programme in 2003, an attack would be even harder to defend. Most important, in the absence of evidence of an Iranian illegal nuclear programme, an attack on Iran's nuclear facilities would likely strengthen Iran's international stature. Such a scenario is more likely to bolster and expand Iran's nuclear aspirations and capabilities in the long term and may act to increase the risk of nuclear proliferation in the region.

The Iraq context

Iraqi reactions to a US attack on Iran will vary depending on ethnic affiliations and the country's underlying dynamics. These have been shaped both by 35 years of dictatorship and totalitarian rule and the US invasion in 2003. When the 'lid went off' in March 2003, a process of 'politicisation' started. The vacuum that appeared after the US invasion unleashed a competition for power among various factions and groups, particularly between Shiites, Sunnis and Kurds (but also within these groups). The political and religious geography of Iraq will continue to play a role in the structure of the country's foreign policy. Shiite Iran is a long-term rival of Iraq and will continue to be seen that way – even

³⁷ Issacharoff Avi, Haaretz.com, 10 December 2006, URL: www.haaretz.com/hasen/spages/798966.html

³⁸ See for example Muslih Muhammad, "The Foreign Policy of Hamas", Council of Foreign Relations, 1999, "Iran pledges Financial Support for Hamas-Run Palestinian Authority", *Associated Press*, February 22 2006, and Kam Ephraim, "Changes in Iran's strategic posture", *INSS, Strategic Assessment*, March 2007, Vol 9 No 4.

among some of the Iraqi Shiites. This is so despite Tehran's efforts to influence policies in Iraq and wield as much influence as possible in the political establishment of the country through Iraq's Shiite communities. A short and swift war against Iran would most likely not cause too much further upheaval in the country. However this is also dependent on Iran's response and whether it will decide to use Shiite proxies in Iraq as a primary line of defence.

Shiites in Iraq

Most of the Shiites in Iraq can be divided into two major factions, one of which is represented by (religious) followers of Grand Ayatollah Ali Sistani. Politically, this group is mainly represented by the Supreme Iraqi Islamic Council (SIIC) and the Dawa party. The other faction follows the teachings of the late Mohammed Sadiq Al Sadr. His son, Muqtada Al Sadr, is the political leader of what is known as the Sadrist movement.

The SIIC was established during the Iran-Iraq war. At that time, it was known as the Supreme Council for Islamic Revolution in Iraq (SCIRI) and had a military branch that was called Badr Brigade. The SIIC was founded in Iran and still receives funds, support and intelligence from Iran. The relationship between Iran and the SIIC is stronger than that between Iran and Dawa, partly due to close personal affiliations between the leadership of the SIIC and their Iranian allies. The Dawa party was founded in Iraq and many of its members refused to leave the country despite difficulties. This cost the party a lot of its followers, who were executed or imprisoned in Iraq.

The Dawa party consists mostly of the Shiite intelligentsia and faced hardship also in Iran as they took issue with the rather rigid regime in Tehran. As Prime Minister Nouri al-Maliki, also secretary-general of Dawa, once said as a Member of Parliament: "Dawa don't like Iranians, and I personally hate them"³⁹. Despite Prime Minister Maliki's feeling towards Iran, both Dawa and the SIIC understand that Iran, regardless of

³⁹ See for example Muslih Muhammad, "The Foreign Policy of Hamas", Council of Foreign Relations, 1999, "Iran pledges Financial Support for Hamas-Run Palestinian Authority", *Associated Press*, February 22 2006, and Kam Ephraim, "Changes in Iran's strategic posture", *INSS, Strategic Assessment*, March 2007, Vol 9 No 4.

its agenda, still represents their strongest ally and an important balance to Arab nations that support the Sunnis of Iraq.

The second biggest Shiite faction is the Sadrists, which became a real political movement only after 2003. A major problem in trying to assess this group is that except for their proclaimed hatred of the Americans, they have never adopted any clear political agenda. Their stand concerning many political issues has been vague and changed over time, something which, in turn, reflects the lack of coherence in the political party itself.

The Sadrists originated in Iraq and from the start, their leaders often pointed out that they were the only Shiite group that did not follow orders or receive instructions from Iran. Yet over time, even the Sadrist leader Muqtada Al Sadr visited Iran, where he declared that any attack on Iran would be an attack on him and his group. The Sadrists helped Nouri al-Maliki in his quest for the post of Prime Minister but later denounced him for his stance on various issues. They sided with the Sunnis against their traditional enemy the SIIC, while the Sadrist militia has carried out some of the largest massacres of the Sunnis, including having been in the forefront of the ethnic cleansing occurring in Baghdad.

Potential reactions from the SIIC, Dawa and Sadrists in the event of a US attack on Iran

On the official level, the Iraqi government would condemn the attack and call for an immediate ceasefire and for both parties to resolve their differences in a peaceful manner. In all likelihood, the Iraqi government would probably also offer to act as a mediator between the warring parties.

An attack could, however, also create problems between the SIIC and Dawa. Dawa would not want to act in any way that could jeopardise their relations with the US. The SIIC would arguably face their biggest challenge so far. While Iran represents the backbone of the SIIC's existence and future plans, they would not want to jeopardise everything they have gained so far in Iraq by going too far in condemning the US, e.g. by asking the US to leave Iraq.

Dawa would most likely seize this chance to try to gain as much as possible from the US. It would probably offer to act as a mediator between the US and the SIIC, trying to convince the SIIC that a somewhat weakened Iran would not necessarily mean losing Shiite power in Iraq or Iranian support.

Should the SIIC still decide to react markedly sharply against a US attack on Iran, then Dawa would probably be forced to separate, or at least distance itself from the SIIC (its strongest ally since 2003) and seek new alliances to ensure its majority in Parliament.

The Iraqi Parliament as a whole would of course also react. Since Parliament is controlled by the Shiite majority together with the Kurdish Alliance, letters of condemnation would most likely be released and other measures, such as suspending sessions, would probably be taken. These more immediate reactions would be geared more towards Iran than the US with the aim of trying to calm Iran by distancing itself from the war.

On a non-official level, however, the Shiite-dominated Iraqi government might go further in trying to stop or hinder any US attack. This would only be the case if the war were to continue for longer than anticipated (and hoped for). If there was a short and swift war, the Iraqis would in all likelihood do as little as possible but urge for a ceasefire.

The Iraqi government could for example try to put as much pressure as possible on the US to stop the attack by issuing indirect threats through its official newspapers and TV stations. In addition, members of the SIIC would most probably facilitate the movements of the Iranian security service to allow for them to launch attacks against Multi National Forces in Iraq (MNF-I). Large demonstrations would probably also be organised to condemn the attack.

It is very uncertain how the Sadrists would handle an American attack on Iran. However, most likely they would seize their chance to attack the US in Iraq as revenge for the casualties they have suffered, and some groups would probably launch such attacks under direct Iranian orders. Sadrists would surely try to hinder US military operations against Iran from Iraq. There would be demonstrations and organised efforts in parliament to pass strong resolutions against the American presence in Iraq.

The US has realised the potential threat of this group. One of the key objectives of the 'surge' was to disrupt the Sadrist lines of supplies and go after their leaders. Interestingly, when the pressure increases, the leader of the Sadrists, Muqtada Al Sadr, usually ends up in Iran. As is the case with the other Shiite groups, the critical factor when judging likely reactions is the course of the war. If an attack is brief, the chances are that even the Sadrists will put caution ahead of the chance to gain short-term advantages on contested turf in Iraq.

Sunnis in Iraq

Compared with the Shiites, the Sunnis do not have the same clear-cut political representation in Iraqi society. Broadly speaking, however, there are two main groups. One is that which chose to participate in the political process along with the Shiites and the Kurds. The other group is that which from the beginning was against the US occupation, as well as political participation⁴⁰.

One group which chose to participate in the political process is the Iraqi Accord Front (IAF). The IAF, in turn, comprises three factions: the Iraqi Islamic party, the Hiwar Front and Ahlul Iraq.

The IAF participated in the 2005 December elections against the warnings of the Islamic Scholars Association (ISA), which is the second group representing the Sunnis in Iraq. The ISA includes extreme religious scholars who are known for their links with the insurgency in western Iraq, especially in the provinces of Anbar and Falluja, as well as foreign Jihadi groups in Iraq.

The Sunnis in Iraq unite on one thing – their hatred and suspicion of Iran. They have for a considerable time been warning of Iran's increasing influence in Iraq. This distrust and hatred is grounded in the view that Iran is a traditional enemy not only of Iraq, but of the whole Sunni Arab world. This view has over the years been reinforced by Iranian claims over Iraqi territories and oil (such as the Shat-al-Arab waterway). In

⁴⁰ This second group does of course constitute a number of more or less loosely organised groups, some of which, through recent political initiatives, have been persuaded to get involved in the political process.

addition, Iran has long been seen as trying to get a foothold in the south of Iraq, where a Shiite majority resides.

Iran is the biggest and strongest ally of the Shiites, who for the first time in the history of Iraq control political power - power which was previously wielded by the Sunnis.

Potential reactions from the Sunnis in the event of a US attack on Iran

It is a fair assessment that several Sunni groups would welcome such an attack, hoping that it would severely weaken Iran and thus Iranian influence in Iraq. After the Sunni withdrawal from government, Prime Minister Maliki issued a strong statement against the Sunni parties, accusing them of not wanting to be part of a government facing challenges but only to sit on the sidelines and criticise its performance. Furthermore, spokespersons for the IAF have on some occasions hinted that the Sunni parties do not want to be part of a government which may condemn or try to stop the attack.

Instead, the Sunnis (at least those who are prepared to get back into the political process) are banking on continued support from the Arab Sunni world. Sunnis are also hoping that the US does not want to further alienate the Sunnis and hence upset the delicate and tentative progress which has been made through the 'surge'.

Any support the Sunnis may provide for the US would be political. Such support would mainly entail statements to the effect that the war was an issue between Iran and the US, and that Iraq should stay out of it.

The Sunnis may also provide the US with support in the form of intelligence concerning Iranian activities in Iraq.

To some extent, such support has already been provided in that intelligence from Sunni-dominated areas, which up till now were 'enemy areas' for the US and its allies, has been forthcoming from tribal leaders concerning foreign Jihadi activists in Iraq.

However, the decisive factor in how Sunni groups would react is the longevity of the attack. If it were to drag out, even the most anti-Shiite

parties would probably try to distance themselves from the US and distance themselves as much as possible from US policy concerning Iran.

Kurds in Iraq

The Kurds can arguably be grateful to the US for a lot of things. The Kurdish zone was created in 1991 with the blessing of the US and with the protection of a US no-fly zone. The US has always supported Kurdish demands for a federal system in Iraq and today the Kurds, for the first time in history, have their own autonomous region.

There are two main Kurdish parties in Iraq. The Kurdistan Democratic Party (KDP) is headed by Massoud Barzani, who is also the president of the KRG. The Patriotic Union of Kurdistan (PUK) is headed by Jalal Talabani, who is also the president of Iraq.

Potential reactions from the Kurds in the event of a US attack on Iran

As mentioned above, the Kurds consider themselves to be strong allies of the US. Even so, the Kurdistan region shares a long border with Iran, a border which could easily be heated up by Iranian-supported insurgencies. However, it is also in Iran's interest to maintain a quiet border with Kurdistan.

Iran could offer concessions to the Iranian Kurds, e.g. allowing them to travel more easily across the border. This is of significance, as many Kurdish families live on both sides of the border. The Iranians could also offer the Kurds for example economic or even military in their struggle with Turkey. At the extreme, Tehran could sanction the formation of a Kurdish state and promise it an outlet to the world in the event of its borders with Iraq and Turkey being closed. However, it is highly unlikely that Iran would go this far.

The US would in all likelihood prefer to keep the Kurds, as well as the rest of Iraq, out of the conflict. A longer war would constitute a real problem for the Kurds and they would therefore, together with the Shiites and the Sunnis, probably try to convince the US to keep it short.

Response of the Iraqi Government

The Iraqi government is banking on being able to escape any US-Iranian confrontation fairly unharmed by putting its assets in both camps. On one hand, the Iraqi government wants to ensure that the US does not leave, just yet. On the other, it is telling the Iranians that they have nothing to fear as long as Iran keeps supporting the Shiite-led Iraqi government.

Furthermore, the timing and message of the so-called 'Quartet Alliance' is of interest. The Kurds are trying to enhance the independence of their region as much as possible (a first test being the referendum on Kirkuk planned for November 2007). For the Shiites, the alliance is a means of trying to stay on top of the political pyramid, holding on to power. Given these preoccupations, the preferred policy, at least at present, is likely to be to try and stay out of any confrontation between Iran and the US.

Iraqis realise full well that they are in no position to challenge Iran, and that at the same time they are dependent on the US staying put. For Iraq, avoiding a war between the US and Iran is therefore the first choice.

Reactions of the Gulf countries

The GCC – comprising the Persian Gulf states of Bahrain, Kuwait, Oman, Qatar, Saudi Arabia and the United Arab Emirates – has for many years anxiously followed Iranian ambitions to become a regional power with enough clout to influence political developments in the region. An Iran with nuclear weapons to back up this goal is an increasing headache for the GCC.

The Iranian regime is of course fully aware of this and has done a lot of political 'footwork' to counter any perception that Iran is a threat (but also issued deterrent rhetoric against those siding with the US), in the process repeatedly stating that Iran's nuclear agenda is only intended for peaceful use. Yet despite this diplomatic offensive by Iran, the GCC as a group would rather see the Iranian nuclear programme fail, or at least be delayed long enough for a less strident regime to take power in Tehran. From a strategic point of view, the GCC views the conflict with Iran, not that with Israel, as the major conflict in the region.

Because of this, a US attack against Iran would probably not lead to any major upheavals in the GCC, provided it is a limited, short and 'surgical' attack aimed solely at nuclear installations and with a minimum of civilian casualties. The leaders of the GCC countries would probably, to various degrees, not mind seeing Iran's nose bloodied. The deep and long-standing conflict between the Sunni and Shia forms of Islam – very often underplayed or outright neglected in the West – still plays a role.

A longer or more drawn-out conflict between the US and Iran would, however, be fiercely opposed by the GCC. The first choice of the GCC is definitely to 'stall' and work for regime change in Iran, banking on the domestic Iranian opposition to ultimately bring down the present regime. The military option comes a long way down the list of preferred options on how to deal with Iran. This has also been underlined by recent statements by the GCC, which has reiterated old positions concerning the importance of keeping the region a nuclear-free zone. The GCC has also made repeated calls for Iran to take note of its position and to emphasise that the GCC is prepared to support any peaceful way of solving the Iranian nuclear problem.

Another reason for the reluctance on part of the GCC for a military option is, of course, that the GCC is no match for Iran militarily. For its defence, the GCC is still dependent on outside forces. Since this at present can only be the US, this is a sensitive issue to say the least.

There is a process in place to build up a regional military force of the GCC (a process which began before the second Iraqi war). So far, however, this force is very small and would not be able to counter any Iranian counter-attacks. This is a genuine threat given that the Iranian regime on several occasions has stated that any attack on its soil would be met by all necessary counter-measures. This is widely interpreted as a threat directed at the GCC to stay out of any conflict, as well as a warning that an attack on Iran would be countered with attacks on countries of the GCC. For Iran, this is a useful way of trying to put a wedge between the US and some of its allies in the Gulf.

An added potential difficulty for the GCC countries is their Shia minorities, which in particular are located in Qatar and Bahrain. Since the Iranian revolution – but dating back to the time immediately following the death of Muhammad in 632 CE – the tension between the majority

Sunni and the Shia has only increased. In the event of a conflict between the US and Iran, it can be assumed that special interest would be focused on Shia minorities. If such a potential conflict were to remain short, however, there is little likelihood of any widespread political violence on the part of these groups. On the other hand, if a conflict were to drag out in time, then Iran would probably try to strike back, partly by stirring trouble in these countries, using whatever assets it has within these minority communities. For such potential conflicts to become a real threat to the stability of the GCC countries, a US-Iran clash would hence need to last for a much longer period than is deemed likely.

Both economically and politically, the GCC could handle a short, swift military attack on Iran but anything longer or more complicated would, for a start, lead to a serious crisis in already strained relations with the US. In connection with this, it should be pointed out that a drawn-out conflict between the US and Iran could also affect other opposition forces within the GCC. Most worrisome for the regimes are the various Islamist movements active in the region. These are often violently opposed to the regimes and could become more active if a conflict drags on.

The Iran-Syria alliance

In early 2005, Iran and Syria declared to the outside world, and especially to the US and Israel, that they had formed a mutual self-defence pact to confront the threats facing them. This declaration came shortly after increased pressure on Syria over the assassination of the former Lebanese Prime Minister Rafik Hariri.⁴¹ The rapprochement was reinforced when the defence ministers from the two countries met in Tehran to sign the mutual defence pact.⁴² Very little is known regarding the details of the pact and the functions of the joint Syrian-Iranian Supreme Defence Commission that was established. However, these declarations were clearly primarily intended to send a political message, aimed to create deterrence against outside intimidation. The alliance between Iran and

⁴¹ MacAskill E. and Campell D. "Iran and Syria confront US with defence pact", *Guardian*, February 17, 2005.

⁴² Pouladi Farhad, "Iran, Syria Sign Defence Agreement", *Agence France-Presse*, Tehran, June 15, 2006.

Syria is not new and its foundation is heavily influenced by outside pressure and common foes.

An anomalous alliance between the secular Arab Baath party regime under the Alawi clan in Damascus and the Persian theocracy in Tehran, pushing for revolution under the banner of Islam, was initially founded shortly after the Iranian revolution. The alliance was based on mutual strategic calculations, common enemies and a desire on part of the countries to enhance their influence on the balance of power in the region. The alliance reached its heights during the Iran-Iraq war in the 1980s, when Syria served as a vital link for Iranian imports and exports. One can argue that the alliance today is based on solid grounds, both historically and traditionally. However, developments in the region during recent decades have considerably changed the political outlook of the two countries. During the 1990s, the relationship between the two grew more distant as Syria embarked on the Middle East peace process while Iran pursued its own interests in the region.

The revival of the alliance was initiated by the weaker party, Syria, after the US occupation of Iraq in 2003. The embarkation on a more aggressive US policy in the region put pressure on both Syria and Iran, while the international investigation of the assassination of the former Lebanese Prime Minister, Rafik Hariri, escalated the precarious situation of the Syrian regime. Hence, the alliance seems to have been shaped by geopolitical realities pushing the two countries into cooperation out of necessity.

In the event of a US attack against Iranian nuclear facilities, the Syrian regime would support Iran by diplomatic means and by acting to reinforce an image of Iran as a victim of US aggression.

Some regional developments, however, involve divergent interests. One is the fact that their mutual enemy, the Saddam Hussein regime, is gone and has been replaced by an Iraq destabilised by sectarian and ethnic divisions. Iran supports some of the Shiite movements that are struggling for increased influence and to some extent propagate for a partition of Iraq along sectarian lines. However, such a development would not be in the interests of the Syrian minority regime as it could jeopardise the sectarian and ethnically diverse social structure of Syria.

Syrian and Iran have shared interests in Lebanon, where the Hezbollah movement is a common instrument of influence. This instrument would become critical for Damascus should Iran decide to broaden the conflict to include Israel. The Syrian president Bashar Al Assad has currently no interest in engaging in a conflict with the US or Israel. The key question in such a scenario is whether Syria would continue to facilitate Iranian support to Hezbollah or rather act to quell any Iranian efforts to influence Hezbollah to engage against Israel. If developments escalate into a military confrontation with Israel across the Lebanese border, such a destabilising approach by Iran and the clear divergence of interests in the Middle East region may thus create a rupture in the alliance.

The Israeli perspective

Israel has a security doctrine markedly based on military pre-emptive attacks against any perceived potential threats to its existence. This was demonstrated by the Israeli attack against Egypt in concert with Britain and France in the Sinai Campaign of 1956, the initiation of the Six Days War in 1967, the attack against the Iraqi nuclear reactor in 1981, as well as the initiation of the war in Lebanon in 1982. Some of these attacks were launched without international support, such as the 1981 attack, illustrating that international support is not regarded as a prerequisite for Israel to act militarily. Israeli pre-emptive attacks have been internationally condemned and have on some occasions led to sanctions. However, the political price which Israel has had to pay has ultimately been insignificant. Any deterioration in relations with other states has been settled quickly and sanctions have been limited and short-lived. That said, even if there are no real political constraints for Israel to take pre-emptive action against Iranian nuclear facilities, the probability of success is low, the risks are high and the costs are certain because of an assured violent counter-reaction from Iran.

The high stakes involved in any Israeli use of force against Iranian nuclear facilities have led to the policy of letting the US, with the support of the European Union, deal with the Iranian threat. A US military strike against Iran would therefore suit Israeli interests from the perspective that Iran is perceived to pose a threat to Israel's existence. However, due to the potential destabilising effects that Iranian retaliatory actions could

have in the region and the risk of an escalating conflict between ethnic and sectarian groups, which could spill over the border into Israel, Israeli officials have declared that Israel prefers a peaceful solution to the Iranian nuclear problem.⁴³

Deterrent rhetoric from the Iranian regime, threatening retaliation against Israel in the event of a US attack, raises the cost of Israeli pressure on the US to deal with the Iranian dilemma and reinforces the image of any conflict being one of US-Israeli aggression against an Islamic state. Even if Iran's military capability is unlikely to pose a major challenge to Israel, asymmetric warfare being an available option for Iran, it can still cause much damage to the Israeli society and population. These aspects boil down to a precarious situation for Israel as to its response and actions in dealing with the Iranian threat, and are currently keeping Israel in a relatively passive mode.

References

AFX Asia: "Iran to build five new oil refineries across Asia", June 11, 2006. London: AFX News Ltd.

Associated Press: "Iran pledges Financial Support for Hamas-Run Palestinian Authority", February 22, 2006. New York: The Associated Press.

Associated Press: "Iran warns U.S. it will retaliate if Struck", February 8, 2007. New York: The Associated Press

BBC (*British Broadcasting Corporation*). "Iran charged over Argentina bomb". BBC News, October 25, 2006. URL: <http://news.bbc.co.uk/2/hi/americas/6085768.stm>

Bergner, Kevin: Brigadier General Multi-National Force-Iraq. Press briefing, July 2, 2007. URL: http://www.mnf-iraq.com/index.php?option=com_content&task=view&id=12641&Itemid=131

Cordesman, Anthont and Al-Rohan, Khalid: "Iranian Nuclear Weapons? Options for Sanctions and Military strikes", CSIS (Center for Strategic and International Studies), Working draft, Revised: August 30, 2006. Washington D.C.: CSIS.

IEA (International Energy Agency): World Energy Outlook 2005, Middle East and North Africa Insights. Paris: OECD/IEA. 2005.

⁴³ "PM Seeks peaceful solutions to nuke row", *The Jerusalem Post*, April 25, 2007.

Issacharoff, Avi: " Hamas minister target of attempted assassination in Gaza", *Haaretz*, December, 10, 2006. URL: www.haaretz.com/hasen/spages/798966.html

Jane's Intelligence Review: "Nukes in the Balance – The Effects of Proliferation on Regional Security", July 1, 2007 Coulsdon: Jane's Information Group.

The Jerusalem Post: "PM Seeks peaceful solutions to nuke row", April 25, 2007. Jerusalem: The Jerusalem Post.

Kam, Ephraim "Changes in Iran's strategic posture", INSS, Strategic Assessment, March 2007, Vol 9 No 4.

MacAskill, Ewen: "Iranian guards are terrorists, US to declare". *Guardian*, August 16, 2007. Manchester: Guardian News and Media Ltd.

MacAskill Ewen and Campell, Duncan. "Iran and Syria confront US with defence pact". *Guardian*, February 17, 2005. Manchester: Guardian News and Media Ltd.

Muslih, Muhammad: "The Foreign Policy of Hamas". New York: *Council on Foreign Relations*, 1999.

The New York Times: "Iran replaces Revolutionary Guard Chief". September 1, 2007. New York: The New York Times Company.

Pouladi, Farhad, "Iran, Syria Sign Defence Agreement". *Agence France-Presse*, June 15, 2006. Tehran: AFP.

Reuters: "King Abdullah Says Jordan Seeks Nuclear Programme", January 1, 2007. URL: <http://www.reuters.com/article/latestCrisis/idUSL19358696>

Salama, Sammy and Ruster, Karen: "A Preemptive Attack on Iran's Nuclear Facilities: Possible Consequences" Monterey: James Martin Center for Nonproliferation Studies, Monterey Institute of International Studies. September 2004.

The Standard: "Iran biggest crude oil supplier to China", Mars 2, 2007. Nairobi: The Standard Group.

The Sunday Times: "Iran Threatens Gulf Blitz if US hits Nuclear Plants", June 10, 2007. London: News international Ltd.

Chapter 4. Domestic consequences in Iran

Nicklas Norling

Chapter 3 outlined the Iranian response towards other states in the event of an attack against the country. This chapter is primarily concerned with the domestic consequences of an attack against Iran, primarily in the political and economic spheres, and what counter-measures the Iranian government is taking and will take to preserve national unity. How would the political climate be affected? Would Iran's economy be able to sustain a lengthy attack against the country and what consequences would isolation have? Is there a risk of ethnic and political disintegration in the country or is nationalism strong enough to withstand an undermining of the central government in Tehran?

The failure to understand the domestic consequences and tensions in Iraqi society had adverse consequences for US state-building efforts in the country. The belief that the nation would unite behind a Shiite-dominated government proved false, while the division of political influence and oil wealth between Shiites, Sunnis and Kurds has proven equally difficult. There are vital differences between the Iraqi and the Iranian state, however. Iran has democratic foundations, decentralised power-structures and a strong nationalism. Iraq, on the other hand, is an artificial nation with severe inherent tensions that were repressed through brute authoritarianism. A comparison of the domestic effects in Iraq and Iran in a post-attack scenario is thus likely to be of little value. Independent of this, however, the turbulence in Iraq demonstrates the importance of appreciating domestic reactions, their complexity and the pitfalls of an excessive confidence in military means.

To appreciate the domestic consequences of an attack on Iran there is a need to understand the contemporary dynamics of Iranian state and society. There is a strong sense of nationalism in Iran that traces its roots through the Persian Empire, the Safavid Empire and the 20th century Pahlavi Dynasty. This nationalism has been further entrenched as a consequence of Iran's isolation after the 1979 revolution. However, in the 1990s, Iran started a gradual process of opening up to the outside world as pressures started to mount for reforms. These included reform of the political system, increasing press freedoms, enhanced interaction

between the Iranian people and the outside world, and demands for economic liberalisation to sustain growth. However, the progressive forces spearheading this have encountered resistance among conservative political forces who perceive such developments to be a threat to the revolution. To hinder further liberalisation of the Iranian polity, the conservatives have resorted to myth-making to reinvigorate the spirit of Khomeini, preserve the values of the Islamic revolution and to find an argument for isolation. An attack would most likely provide conservative forces with such an argument.

This myth-making primarily relates to Iran's history of foreign occupation and intervention. The CIA-sponsored coup that removed democratically-elected President Mossadeq from power in 1953, following his nationalisation of the oil industry, still looms large in the memory of the Iranian people. The 1953 events are also a powerful tool in convincing the Iranian public that the West's stated ambitions of bringing democracy to the Middle East are hypocritical at best and devastating at worst. These analogies are strong enough to rally the Iranian people behind the current regime's cause.

Thus it is relatively safe to assume that the faction in Iranian politics that would emerge strongest from an attack would not be the reformists but the nationalistic, isolationist and militaristic forces of the country. Iranian domestic politics is a constantly shifting arena in which the main factions of the country are vying for influence and the distribution of power within this arena will likely shift if military action is taken. As such, an attack would act as a divisive factor in altering the distribution of power in Iran's political system which, in turn, will have further consequences for economic, domestic and foreign policies.

This does not necessarily mean that it would be strategically counter-productive for the US to employ military means to advance *its interests* in Iran. A strengthening of radical forces does not preclude the potential for the US (or any other attacker) to achieve strategic gains in other respects. Surgical air strikes on Iran's nuclear facilities may, if successful, delay or eliminate a potential nuclear weapons-armed Iran which could, in theory, present a far greater danger to the world and region than if the hard-liners remain in power without nuclear weapons. This trade-off presents a dilemma for Washington, especially since the US certainly recognises

the internal momentum that the reformists have built up and which may be disrupted if Iran destabilises.

Political effects

Ever since the Islamic revolution in 1979, pressure has been mounting on the Iranian state for reforms. This culminated with the election of reformist President Khatami in 1997 but suffered a severe set-back with the return of the hard-liners in the local council elections of 2003, the parliamentary elections of 2004 and the presidential elections of 2005. These two parallel forces – one radical and one reformist – are trying to pull Iran in diametrically opposing directions while Supreme Leader Khamenei is trying to maintain a balance between them.

This political transition and struggle have been particularly pronounced in the past two years. On the one hand, and since the defeat of reformist president Khatami in 2005, a re-strengthening of reformist and liberal forces can be observed. This has been manifested both in the local council elections of 2006, in which reformists scored victories, and through the appointment of officials with reformist leanings to important foreign policy advisory boards.⁴⁴ Moreover, former president Ali Akbar Rafsanjani has consolidated his powers within the Assembly of Experts and the Expediency Council at the expense of the hard-liners spearheaded by Ayatollah Mesbah-Yazdi.⁴⁵ On the other hand, a parallel radicalisation of Iranian politics has also taken place in the past few years. Since President Ahmadinejad assumed office in 2005, a militarisation of the Iranian state and government can be discerned, while the Islamic Revolutionary Guard Corps (IRGC) has strengthened its influence within the political arena. The 2008 parliamentary elections also brought massive gains to conservative forces.

Nevertheless, if military measures are used against Iran the main factions of Iranian politics would most likely join forces rather than fight each other. History shows that in times of crisis, Iranian political factions tend to unite.

⁴⁴ The appointment of former Foreign Minister Kamal Kharazmi to head the Strategic Council for Foreign Relations is one such example.

⁴⁵ Mesbah-Yazdi is also widely regarded as protégé of President Ahmadinejad.

To stay in power, the unpopular⁴⁶ government of Iran has a vested interest in portraying the country as being under 'siege', with foreign powers conspiring towards the country, and to remind the population at regular intervals that an attack is imminent. Even if most Iranians mock the poor governance of its leaders, they still remember the West's support of Iraq in the 1980-1988 Gulf War. The militaristic faction, particularly represented in the IRGC, is also keen to remind the Iranian population of this.

The IRGC and the Ahmadinejad/Mesbah-Yazdi faction nurtures a policy of confrontation and isolation pursued by the US and it is in the IRGC's interest that this continues. Not limited to this, the IRGC is also the state organ in control of the nuclear installations, the main proponents of Iran's nuclear programme, while its networks of companies are main contractors in the construction of Iran's nuclear infrastructure. In consequence, the current government has both a vested interest in seeing its investments unharmed but also that that US threats of 'regime change' and bombings of the nuclear installations continue. This has proven to be a difficult tightrope walk.

While the possibility cannot be excluded that some parts of the Iranian establishment would reluctantly welcome a disruption of the nuclear programme, a substantial majority would consider strikes against it a clear act of aggression. Rather than diminishing support for the nuclear programme and 'modernisation', strikes would probably increase support for it. Polls regularly show that some 80% of the population supports 'Iran's access to nuclear technology as a right that reflects and contributes to Iran's advanced scientific status'⁴⁷. A targeting of the programme would thus carry much symbolism and be an attack against Iranian nationalism.

⁴⁶ A study leaked from Iran's interior ministry shows that that nearly 90% of the people are dissatisfied with the current government, 28% want 'fundamental changes', while 66% advocate gradual reforms. See Nikki Keddie, *Modern Iran: Roots and Results of the Revolution* (New Haven & London: Yale University Press, 2006), pp. 282-283.

⁴⁷ Shahram Chubin, *Iran's Nuclear Ambitions* (Washington DC: Carnegie Endowment for International Peace, 2006), p. 28. Even if such polls are notoriously unreliable, especially since they often fail to include the *cost* of it and whether it is worth, say, an invasion - they nevertheless reflect a general sentiment of the nuclear cycle as an issue of national pride.

The reactions of the domestic political climate also depend on the timing of an attack. Parliamentary elections are scheduled for March 2008 and presidential elections for 2009 and the important electoral period that Iran is currently entering would probably be adversely affected by an attack. Should a limited air campaign take place within a year, it would most likely affect the results of the 2009 presidential elections. Those forces in Iran that advocate a more open approach to the West and sympathise with Khatami's 'dialogue of civilisations' will be unable to keep to these commitments in the official debate. Candidates with such sympathies would probably be disqualified ahead of the elections by the Guardian Council (which is the institution vetting candidates eligible to run in the elections).

Economic effects

The political transition of Iran toward reformism has also been accompanied by a push for economic liberalisation. To promote economic development and prevent the Iranian economy from collapsing, the clergy has grudgingly accepted to abandon the previously embraced import-substitution-industrialisation (ISI) strategy in favour of an export-orientated industrialisation.⁴⁸ While the former promoted self-sufficiency, isolation and an agrarian economy, the latter attempts to adapt to the modern world economy through specialisation and in using foreign trade as the main driver of growth.

The trade liberalisation that Iran undertook during the Khatami era (1997-2005) has led to a surge in imports, high import dependency and a high domestic demand. Foreign trade as a share of Iran's GDP is currently close to 60%⁴⁹ which also renders Iran vulnerable to economic sanctions or a blockade. As Ali Ansari argues: "A trade-based economy like Iran's requires networks and cannot function in an environment of growing isolation."⁵⁰ The use of military measures or an economic blockade against Iran will thus likely lead to capital flight, a decline in

⁴⁸ This shift was most clearly manifested with the change of Principle 44 in the constitution in 2004, which specifies that foreign trade and state-owned industries/services may only exist under state control.

⁴⁹ See the Federation of International Trade Associations, <http://www.fita.org/countries/iran.html>, accessed on April 7, 2007.

⁵⁰ Ali Ansari, *Iran under Ahmadinejad*, Adelphi Paper (London: IISS & Routledge, 2007), p. 84.

foreign investments, and further isolate the country in a phase when Iran is seeking to open up to foreign investments, privatisations and integration into the world economy.

Hopes that economic sanctions or a blockade would bring down the Iranian government or trigger another revolution are probably unfounded. Such aspirations ignore the inherent resilience in the Iranian economy and how it has become adaptive to exogenous shocks and isolation following decades of sanctions and war.

Similarly, an air campaign against Iran's nuclear installations would most likely lead to instability and short-term capital flight, but would presumably not be much worse than the current government's mismanagement of the economy.⁵¹ Moreover, while large-scale bombings of economic infrastructure (e.g. refineries) would probably inflict major damage on Iran's economy, it is highly unlikely that the damage imposed would reach even a fraction of that incurred during the 1980-1988 Iran-Iraq war. These factors, combined with the availability of a number of new Asian trading partners, have also diminished the efficiency of economic sanctions, bombings of economic infrastructure or economic blockade as a tool.

An efficient economic blockade on land is also unlikely considering Iran's porous borders with its neighbours. Moreover, the smuggling networks that have been built up as a response to subsidies, price-distortions and sanctions can probably also circumvent and reduce the impact of an economic blockade at sea.⁵² Iran's heavy dependence on petrol imports is likely to be a target⁵³ of an economic blockade but petrol rationing and smuggling⁵⁴ could probably make up for this loss in the short term, although prices would be raised correspondingly.

⁵¹ For an assessment of this, see: International Crisis Group, "Ahmadinejad's Tumultuous Presidency," *Middle East Briefing* No. 21, February 6 2007.

⁵² As a consequence of international isolation, much of the Iranian foreign trade is now conducted outside of the formal economy and it is estimated that as much as 60% of Iran's foreign trade takes place outside of government control. See: Kazem Alamdari, "The Power Structure of Islamic Republic of Iran: Transition from Populism to Clientelism, and Militarization of the Government," *Third World Quarterly*, 26, 8 (December 2005), p. 1291.

⁵³ See for instance: "Iran Gasoline Imports are Leverage: State Dept.," *Reuters*, March 29 2007.

⁵⁴ Some of the smuggling networks that have been established are also alleged to have connections to the IRGC, especially in the smuggling of gasoline to Turkey, Pakistan, Afghanistan, and Iraqi

Effects on national unity/stability

The risk of ethnic disintegration of Iran in the event of an attack is relatively small. Iran has seen discontent among Arabs, Kurds, Turkmen, Baluch and Azerbaijanis along its borders, but these are mostly concerned with discrimination or socio-economic issues. Most of the peoples populating Iran's border areas also perceive the instability in neighbouring countries as a threat rather than as an opportunity for cross-border integration. There are separatist movements among the Arabs in the oil-rich Khuzestan region in south-western Iran bordering Iraq and a Sunni resistance movement in Sistan-Baluchistan and among the Kurds. However, only a minority of the people living in these small Sunni-dominated areas sympathise with the agendas of these groups. Azerbaijanis, making up around 1/3 of the population, do not have any similar separatist movement but some ethnic unrest has plagued northern Iran. Overall, none of the ethnic groups (with the possible exception of the Kurds) have demonstrated any widespread support for secession.⁵⁵

Supporting secessionist elements, primarily in the Iranian provinces of Sistan-Baluchistan and Khuzestan, is thus unlikely to receive a broad support base and an insurgency depending on these groups has low chances of succeeding. There is also a risk that it would backlash and trigger a strong wave of nationalism and repression of minority groups perceived to be agents of 'foreign powers'. Besides, any attempt to meddle with Iran's ethnic composition would most likely trigger a similar tactic by Iran and inflame further sectarian violence and attacks against US troops in Iraq. This would mainly be accomplished through its Qods Force and other paramilitary elements.

Kurdistan. See: International Crisis Group, "Ahmadinejad's Tumultuous Presidency," *Middle East Briefing* No. 21, February 6 2007, p. 8-12.

⁵⁵ John R. Bradley, "Iran's Ethnic Tinderbox," *Washington Quarterly*, Vol. 30, No. 1 (Winter 2006/2007), p. 188.

Using US Special Forces in fomenting unrest or to promote regime change also carries risks. The US has painful memories of the Iranian hostage crisis and the risks of operating in Iran. The failed rescue attempt on April 25, 1980, which led to the crash of a US helicopter, killing 8 troops and a major political setback for the Carter government, is likely to act as a restraining factor on a similar operation today.

It is improbable that the US (or any actor) planning military measures against Iran would consider the fuelling of an insurgency among the ethnic minorities a serious option by itself. This said, the invasion of Iraq and Afghanistan combined with the dissolution of the Soviet Union and the formation of independent states along Iran's northern border have led to increasing demands for political participation and cultural rights among some of these groups. Accordingly, if regime change is the ambition of military force there is a need for planning the political structure of the country and how to respond to the demands from Iran's various ethnic groups.

Conclusions

Three main conclusions can be drawn from the discussion above. Firstly, the political climate would be adversely affected by an attack and Iran would most likely retreat into self-imposed isolation. Simultaneously, the hard-line and populist forces would be strengthened, while the reformists would have a tough time convincing their supporters of the value of cordial US-Iran relations.

Secondly, Iran would probably be able to withstand a long-term economic blockade but it would harm Iran's economic liberalisation process. An economic blockade may involve fewer risks depending on what form it takes but it would also involve heavy financial costs and a further price hike on the oil market. In addition, many Asian powers such as China and Japan would probably protest such actions and abstain from participating in any blockade. The resilience of Iran's economy also renders a revolution, as a consequence of economic hardship, unlikely. It is more likely that it would backfire and be viewed as a denial of Iran's right to economic development.

Thirdly, the risk of ethnic disintegration in Iran is comparatively small. It is unlikely that Iran would spiral down into chaos similar to that experienced in Iraq if the regime is overthrown or if a revolution takes place, but it is nevertheless guaranteed to be violent considering the severe struggle for political and economic power among the factions in Iranian society and politics. Nationalism is strong in Iran and it will likely act as a safeguard to disintegration.

Taken together, any use of force against Iran will probably be met with condemnation from the Iranian people. Considering that history abounds with examples of peoples that have united with their government, however unpopular, when under attack, this is not a surprising conclusion. However, the particular history of Iran and the current government's use of that history must be considered when anticipating the likely responses to aerial attacks, foreign support of insurgency movements, or other military measures.

Today, there are few who doubt that Iran is undergoing a process of gradual change towards reform and that substantive political change is bound to come in Iran. Leaving the elimination of radical and hard-line forces to the political system and the reform movement is thus an attractive option. The problem is, however, that conservative forces still dominate the institutions that wield real power (e.g. the Assembly of Experts, the Guardian Council and the Office of the Supreme Leader) and are bound to remain there in the shorter term. Thus a cost-benefit analysis of the domestic consequences of an attack on Iran must, inescapably, consider whether the 'nuclear clock' or the 'reform clock' is ticking fastest.⁵⁶ This is not a simple question, but it is important to consider Iran's liberalisation process as one of the most essential components in Iran's long-term moderation. Harming it would therefore come at a very high price.

References

Alamdari, Kazem: "The Power Structure of Islamic Republic of Iran: Transition from Populism to Clientelism, and Militarization of the

⁵⁶ As mentioned by one of the participants at the FOI conference.

Government". *Third World Quarterly*, Vol. 26, Nr. 8, December 2005, pp. 1285-1301. Oxford: Routledge.

Ansari, Ali: *Iran under Ahmadinejad*, Adelphi Paper. London: IISS & Routledge, 2007.

Bradley, John R: "Iran's Ethnic Tinderbox", *Washington Quarterly*, Vol. 30, No. 1, Winter 2006/2007, pp. 181-190. Washington D.C. and Cambridge: Centre for Strategic and International Studies and Massachusetts Institute of Technology.

Chubin, Shahram: *Iran's Nuclear Ambitions*. Washington DC: Carnegie Endowment for International Peace, 2006.

Federation of International Trade Associations: April 7, 2007. Source: <http://www.fita.org/countries/iran.html>

International Crisis Group: "Ahmadinejad's Tumultuous Presidency". *Middle East Briefing* No. 21, February 6, 2007. Teheran and Brussels: International Crisis Group.

Keddie, Nikki: *Modern Iran: Roots and Results of the Revolution*. New Haven & London: Yale University Press. 2006.

Reuters: "Iran Gasoline Imports are 'Leverage': State Dept". March 29, 2007. URL: <http://www.reuters.com/article/topNews/idUSWAT00723720070329>

Chapter 5. Iran from the Russian perspective

Ingmar Oldberg

Background

During Vladimir Putin's presidency since 2000, Russia has become increasingly authoritarian, moving away from being an incipient democracy to assuming a very specific, authoritarian Russian form of democracy. Power has been concentrated to the executive federal power, and all serious political opposition has been brought under control or crushed. This development has had the support of a solid majority of the population. One explanation and rationale for this is the wish for stability and security as opposed to disorder, dissolution and terrorism, as exemplified by Chechnya in the 1990s. A complementary reason for Putin's success has been the favourable economic development of Russia since 1999, mainly as a result of booming world market prices for oil and gas, Russia's main export commodities.

Strengthened by this domestic development, Russia under Putin has adopted a more self-confident foreign policy, asserting its position as one of the great powers of the world, entitled to respect and influence in all international fora. Russia points to the fact that it is not only one of the five permanent members of the UN Security Council and a member of the G8, but also has the largest territory in the world with the greatest energy reserves. It is the strongest nuclear power beside the United States and heir of the Soviet Union – the great power which defeated Nazi Germany and subsequently governed half of Europe.

One way for Russia to extend its influence is to fight for multipolarity in world politics, which, in effect, means fighting US dominance (unipolarity). As part of this endeavour, Russia looks for allies around the world, not least in Asia.⁵⁷ One such ally, next to China and India, is obviously Iran.

⁵⁷ More on this in Oldberg, "Russia's Great Power Ambitions and Policy" and other chapters in Roger E. Kanet (ed.) *Russia: Re-Emerging Great Power*, Palgrave Macmillan, Basingstoke-New York 2007.

However, at the same time Russia wants to cooperate with European states as its economy has become highly dependent on them. Moscow also wants to avoid conflicts with the United States due to common interests concerning international terrorism, nuclear proliferation and crisis management. These factors are also reflected in Russia's Iran policy, as is shown below.

Russia and Iran since the 1990s

Political relations

Ever since the Khomeini revolution in 1979, when Iran broke off its ties with the US, the USSR (and Russia after 1991) has had good official relations with Iran. Iran is often called a strategic partner and a neighbour (despite the geographical distance). At an international security conference in Munich 2007, Putin characterised Iran as Russia's long-time stable partner and Russia was a friend that Iran can trust.⁵⁸ As opposed to the US, Russia has refused to consider Iran a sponsor of international terrorism, notably with regard to Hezbollah in Lebanon and Hamas in the Palestinian territories. Moscow supported the inclusion of Iran as an observer in the Shanghai Cooperation Organisation (SCO) in 2005, as well as its participation in SCO meetings and activities, for instance the 2007 summit in Kyrgyzstan. The SCO in 2005 called for a deadline for US troops in Central Asia and has stated that it supports multipolarity.⁵⁹ Furthermore, Russia holds that Iran can a positive role in stabilising Iraq, and both states are interested in seeing a withdrawal of foreign troops from Afghanistan once the Afghans can take full responsibility for their own security. Both Iran and Russia have opposed US plans to create a multinational naval force including NATO units in the Caspian Sea. Instead, Russia proposes a naval force only composed of units from the

⁵⁸ Hannes Adomeit, *Russlands Iran-Politik unter Putin*, SWP-Studie, April 2007, Stiftung Wissenschaft und Politik, Berlin, p. 11 f; President of Russia, "Speech and the following discussion at the Munich Conference on security policy", 10 February 2007, <http://www.president.kremlin.ru/eng/text/speeches/2007/02/10/0138>, retrieved 15 February 2007.

⁵⁹ Oldberg, *The Shanghai Cooperation Organisation: Powerhouse of Paper Tiger?*, FOI-R—2301—SE, June 2007, pp. 17 ff.

littoral states, which Russia would dominate by strength of its Caspian Flotilla.⁶⁰

After several Iranian officials visited Moscow, in October 2007 Putin – as the first Russian leader since Stalin in 1943 – finally paid a visit to Tehran to attend the second summit of the five Caspian states. On Iran's initiative the presidents decided to create an institutional framework for regional cooperation, starting with regular meetings, on economic, legal and some security issues (compared with SCO). They agreed that all shipping and fishing in the sea should be carried out under the flags of the riparian states and all legal issues be resolved peacefully by themselves, a formulation that seems to forestall assistance from other parties. More significantly, the summit declared that the states would never use armed force against each other or allow their territories to be used for attacks against another riparian state. This clause appears designed to stop the United States from using Azerbaijan as a base for attacking Iran.⁶¹

Concerning the division of the Caspian seabed and its resources, the parties agreed to adhere to the existing rules. Iran in principle wants to divide the sea equally among the five, while the others want shares in proportion to the lengths of their coastlines, which would give Iran only 13%. This dispute has even led to Iranian shows of force *vis-à-vis* Azerbaijan.⁶² For Russia, however, this dispute has had the beneficial effect of disturbing Western-supported plans to build pipelines across the Caspian circumventing Russia. At the summit Russia – supported by Iran but opposed by the others – proposed that pipeline projects had to be approved by all coastal states due to environmental risks.⁶³

⁶⁰ Adomeit, p. 11f, President of Russia, "Interview with IRNA Information Agency", 16 Oct., <http://www.president.kremlin.ru/eng/text/speeches/2007/10/16/1450>; *Eurasia Daily Monitor* (EDM), Jamestown Foundation, No. 27, 7 February 2007.

⁶¹ President of Russia, "Speech at the opening of the Second Caspian Summit", "Answer to a question", 16 Oct.; EDM, No. 194, 19 Oct. 2007.

⁶² Robert O. Freedman (2007) "Russia, Iran and the nuclear question: The Putin record", in Roger E. Kanet, *Russia: Re-Emerging Great Power*, pp. 203 f; Adomeit, pp. 12 f.

⁶³ President of Russia, "Speech at the opening", 16 Oct., EDM, No. 192, Oct. 2007, Dagens Nyheter, 17 Oct. 2007.

However, there are some sources of friction between Russia and Iran. Iran also sees itself as a great power,⁶⁴ and Russia is evidently wary of Iranian ambitions in Central Asia where Russia still has a strong influence. Thus, Iran has improved ties with Turkmenistan since a new leader came to power there.⁶⁵ Early in 2007, Iran suggested that Russia and Iran together should ensure stability in Central Asia and the Caucasus.⁶⁶ Moreover, Russia dislikes President Ahmadinejad's calls for annihilating Israel, since Russia maintains good relations with Israel and as a member of the Quartet (together with the UN, US and the EU) tries to mediate between Israel and the Palestinian Authority.⁶⁷ However, the main reason for Russia keeping a distance *vis-à-vis* Iran is obviously its conflicts with the United States and its allies on a number of issues, especially nuclear and military, which are dealt with below. Consequently, Russia and the other SCO members have not accepted Iranian pleas for membership of the SCO. It remains to be seen what will come out of the Caspian organisation.

Trade and energy

In line with the political relations, economic relations between Iran and Russia have also developed substantially over recent years. Russian-Iranian trade tripled in the period 2000-2006, most of it consisting of Russian exports of material for the Bushehr nuclear power station, investments in the Iranian energy sector, and weapons and military equipment. Iranian exports consisted mainly of fruit and cars (!). The energy sector is of crucial importance to both states. Russia has proposed an energy club within the SCO and the creation of a 'Gas-OPEC' which would include Iran – the country with the second largest gas reserves in the world. Within the framework of the Caspian Sea Republics Oil Swap (CSROS), Russian companies deliver oil to Iran via the Caspian Sea, while Iran delivers the same amount to customers at ports in the Persian Gulf. Russian Gazprom owns the company that is building a gas pipeline from

⁶⁴ Mehdi Sanaie, "Problems and prospects of Iranian-Russian relations", *Russia in Global Affairs*, No. 2, 2007, p. 1. <http://eng.globalaffairs.ru/printver/1137.html>, retrieved 15 August 2007.

⁶⁵ EDM, No. 124, 26 June 2007.

⁶⁶ EDM, No. 27, 7 February 2007.

⁶⁷ More on this in Oldberg, *The War on Terrorism in Russian Foreign Policy*, FOI-R—2155—SE, December 2006, pp. 30 f.

Iran to Russia's close ally Armenia.⁶⁸ At the Caspian summit Presidents Putin and Ahmadinejad signed a statement envisaging participation by Russian companies in the development of oil and gas deposits in Iran and coordination of marketing policy in gas exports. The latter may serve to bring Iranian gas exports under Russian control and defy US economic sanctions.⁶⁹ Iran, Turkmenistan and Kazakhstan have also agreed to build a north-south railway connection, which Russia supports as it counts on a link-up with the Russian network.⁷⁰

However, in the economic sphere too there are conflicting interests and constraints. Iranians have complained that the trade is highly unbalanced in Russia's favour (1:20). Russia has to a large extent profited from Western embargoes against Iran. Simultaneously, volumes do not amount to more than USD 2 billion (2006), dwarfed by Russian trade with Turkey (USD 10 billion) and Israel (USD 6 billion). Russia and Iran are also competitors as regards oil and gas. Russia wants to keep its grip on Central Asian energy production and its monopoly on exports via pipelines running through Russia to the West, while Iran wants to expand and build alternative pipelines. Iran notably helped Georgia when the latter was exposed to a Russian energy blockade in 2006, so Gazprom decided to tailor the capacity of the future gas pipeline from Iran to Armenian needs only.⁷¹

Arms export and military cooperation

Ever since the 1980s Russia has been Iran's main arms purveyor, selling Tehran arms such as MiG 29S and Su-24MK fighters, helicopters, air defence systems, submarines and up to 2,000 tanks. In 2003, Iran reportedly became Russia's third largest arms customer. In 2000, Russia abrogated an agreement with the United States on restricting its arms trade with Iran and in 2005, Russia started to deliver more sophisticated equipment for submarines and fighters as well as Su-25Ts to Iran. The sale of 29 Tor-M1 missiles, one of Russia's most modern anti-aircraft

⁶⁸ Adomeit, pp. 15 ff; Sanaie, pp.4 ff.

⁶⁹ EDM, No. 192, 17 October 2007.

⁷⁰ President of Russia, "Interview with IRNA", 16 October, EDM, 19 Oct. 2007. Iranians have talked about building a canal between the Caspian Sea and the Persian Gulf! (Sanaie, p. 5).

⁷¹ Ibidem.

missiles which could be used to defend Iranian nuclear facilities, upset the US. Furthermore, Russia was suspected of having helped Iran develop more offensive middle-range missiles with a range of up to 3,000 km, which could carry weapons of mass destruction (WMD). On top of this, according to recent reports, the Russian arms exporting company Oboroneksport is about to sign a contract for the sale of 250 Su-30MKM long-distance fighter-bombers (range 3,000 km) and 20 fuel tanker planes with the first delivery in 2007. This would be Russia's largest arms sale in 30 years.⁷² Russia also cooperates with Iran in space research by constructing and launching communication and intelligence satellites for Iran in Siberia, cooperation which also has military implications. In 2006, the US imposed sanctions on two Russian military export companies, including Oboroneksport, for violating the Iran Non-proliferation Act.⁷³

However, Russia claims that it has only sold defensive weapons to Iran and in limited quantities. There seems to be some truth in this, at least until late 2006. Iran's third place in Russian arms exports (USD 270 million) does not account for more than 5.6% of Russian total arms exports and on average about USD 50 million in 2000-2006. According to other official reports, Iran is behind Algeria and Kuwait on the list of importers of Russian arms.⁷⁴ It is worth noting that the MiG and Su-24 fighters delivered to Iran were outdated. The number of tanks did not make up for those Iran lost in the long war with Iraq, and Russia did not deliver modern attack helicopters and strategic anti-aircraft missiles such as the S-300PMU1 or the ballistic missile SS 26 Iskander. Furthermore, China and North Korea have probably helped Iran more than Russia has with missile technology. The Tor-M1 missiles only have a range of 12 km and can only reach targets at an altitude of maximum six kilometres.⁷⁵ At the Munich security conference Putin explained that Russia delivered this system so that Iran would not feel driven into a corner, adding that Russian military cooperation with Iran was minimal and that Russia delivered much less arms to the Middle East than other countries,

⁷² DEBKAfile, DEBK reports, 1 August 2007, debka.com/headline_print.php?hid=4449, retrieved 21 August 2007.

⁷³ Adomeit, pp. 20 ff; table of deliveries, p. 222, *EDM*, No. 152, 7 August 2006, No. 5, 8 January 2007, No. 12, 17 Jan 2007.

⁷⁴ Adomeit, pp. 22 ff.

⁷⁵ Adomeit, p. 23; *EDM*, No. 12, 17 January 2007.

including the United States.⁷⁶ Concerning the reported sale of 250 fighter-bombers, it remains to be seen whether Iran can pay for them, allowing for actual delivery. Another unanswered question is where fuel tankers could be based to support these bombers.

Russia criticised the US decision in 2006 to build a radar base in the Czech Republic and a missile base in Poland to meet the perceived threat of long-range Iranian missiles. Moscow viewed these planned bases as components of a global system directed against Russia. At the 2007 G8 summit Putin claimed that Iran only had missiles with a range of 1,600-1,700 km and that these therefore could not reach the southern borders of Europe at a distance of 4,500-5,000 km. He assured that Iran “does not even have plans at this point” to produce such missiles, nor to attack Europe.⁷⁷ He demanded that the programme be frozen so long as there was no evidence of an Iranian nuclear or missile threat. At the Munich conference Putin said he doubted Iran was technologically and economically capable of producing such missiles.⁷⁸

Still, in order to strike a compromise with the US, Putin offered the joint use of a Russian radar base at Gabala in Azerbaijan and said interceptors could be deployed in Turkey or on mobile platforms at sea.⁷⁹ Later Putin proclaimed that if a missile defence system were to be built, it should be done together and demanded ‘democratic access’ to the system.⁸⁰

The Russian proposal was of course criticised in Iran, as it implied that Russia agreed that there was an Iranian threat. Azerbaijan’s endorsement of the proposal also rankled with Tehran.⁸¹ However, US officials soon rejected the idea, claiming that the Gabala radar could only be used for detecting missile launches, not to guide interceptors. Nevertheless, in October US officials intimated that the missile defence plans in Europe could be down-sized if Iran halted its nuclear and missile programmes. Defence Secretary Robert Gates announced that the missile defence

⁷⁶ President of Russia, “Speech”, 10 February 2007, p. 9

⁷⁷ President of Russia, “Press conference following the end of the G8 summit”, 8 June 2007, www.president.kremlin.ru/eng, 14 Aug. 2007, p. 2.

⁷⁸ On another occasion Putin conceded that Iran might have 2000-2400 middle-range missiles (Vladimir Putin, “I do not rule, I simply do my work”, *International Affairs*, No. 2, 2007, p. 7.)

⁷⁹ President of Russia, 8 June, p. 2.

⁸⁰ President of Russia, “Interview with IRNA”, 16 Oct. 2007.

⁸¹ *EDM*, No. 125, 27 June 2007.

would be fully activated only when a real threat emerged in Iran, such as long-range missile tests, and that Russian inspectors could be invited to the bases. These ideas seem intended to make Moscow put pressure on Iran. One problem with the proposed inspections, however, was that the base countries rejected a Russian military presence.

The nuclear issue

Russia cannot be said to have created or inspired Iran's nuclear programme, but it has certainly contributed to it. Russia's nuclear cooperation with Iran started in 1995 when it agreed to finish the construction of a VVER 1000 MW water-cooled reactor at Bushehr. The German company Siemens started (with American approval) to build the reactor in 1974 but deserted it in 1980 at which time it was 80% ready. In a secret protocol, Russia promised to build a research reactor, deliver raw uranium, which Iran only has in limited quantities, build an enrichment facility and train nuclear specialists. Even if President Yeltsin agreed to eliminate the possibility of weapon-grade plutonium production in response to US criticism, Russia's Minister for Nuclear Energy Mikhailov made clear that the delivery of an enrichment plant could be made at a later stage. Mikhailov argued that enrichment is not necessarily conducted for military purposes and that Iran is entitled to enrichment capabilities according to IAEA rules. Mikhailov's successor Adamov said he was sure Iran was trying to build nuclear weapons, but that he saw no reason to break off the nuclear cooperation.⁸²

In line with this, in 2002 Russia signed and started to implement a ten-year agreement with Iran on nuclear cooperation, which included the construction of six reactors, four of which were at Bushehr, and the training of hundreds of Iranian researchers and engineers. In 2006, some 2,000 Russian specialists worked at Bushehr.⁸³ Russia is also reported to have assisted Iran in uranium enrichment using laser technology. In 2005, Russia agreed to deliver uranium fuel to Iran six months before starting the Bushehr reactor, whereas Iran pledged to return the spent fuel to Russia within five years. According to Greenpeace, this time-frame

⁸² *Adomeit*, pp. 30 ff.

⁸³ *Sanaie*, p. 5.

would allow Iran to derive plutonium for 161 nuclear bombs.⁸⁴ In the face of US protests, Putin kept repeating that Iran did not plan to build nuclear weapons. Moscow continued to oppose international sanctions against Iran and instead advocated negotiations. Russian observers also pointed to splits in the Iranian leadership which could be exploited in negotiations, increasing their chance of success.⁸⁵ Even when Iran in April 2007 triumphantly announced it had enriched uranium and proclaimed itself as a nuclear power, Russian nuclear experts unanimously slighted the progress as insignificant, and Russia's ambassador to the UN said he saw no reason for punitive measures.⁸⁶ Russia was pleased when the IAEA in September 2007 concluded that there were no more outstanding issues regarding Iran's nuclear programme and rejected the US view that Iran was only playing for time.⁸⁷ The Caspian summit in October 2007 declared in support of Iran that all states have a right to the peaceful use of nuclear power without being restricted. Putin explained that every military action in the region would be unacceptable, and that it was useless to scare the Iranian people.⁸⁸

However, there are some Russian experts who believe Iran is aiming to acquire nuclear weapons. According to a study by the prestigious Council for Foreign and Defence Policy (SVOP) of March 2006, the Iranian elite is convinced that, judging by the examples of Pakistan and North Korea, only nuclear weapons can grant Iran the status of a regional superpower and stabilise the domestic situation. SVOP believes that although the process can be stopped, it is only a matter of time before Iran acquires nuclear weapons. According to some observers this may take from a half to two years, while others estimate five years. Other observers do not seem to regard an Iranian nuclear bomb as catastrophic, as long as the regime in Tehran remains stable. Russia's former Deputy Minister of Defence Andrei Kokoshin has opined that an Iranian bomb is a greater threat to Washington and Jerusalem than to Russia.⁸⁹ Such

⁸⁴ Adomeit, p. 38, footnote 109.

⁸⁵ Adomeit, pp. 34 ff, *EDM*, No. 73, 14 April 2006.

⁸⁶ *EDM*, No. 73, 14 April 2007.

⁸⁷ Yevgeny Primakov, "US-Iran: bluffing or going for broke, *The Moscow News*, 13 September 2007; *EDM*, No. 181, 1 Oct. 2007..

⁸⁸ *Svenska Dagbladet, Dagens Nyheter*, 17 Oct. 2007.

⁸⁹ Adomeit, p. 40, *EDM*, No. 73, 14 April 2007.

views may in fact have emboldened the Iranian leadership in its resistance to Western pressure.

However, it is also true that the Russian leadership became more worried about Iran and willing to cooperate with the West when the IAEA discovered that Iran, since 2005 under its new radical president, had withheld information and proceeded with enriching uranium. Clearly, it is not in Russia's interest to get a nuclear-armed Islamic power near its southern borders, something which Russian officials have at times acknowledged. Putin has stated that Russian security – like American – strongly depends on promoting non-proliferation of nuclear weapons, their carrier systems and other WMDs. Thus, in 2003 Russia agreed with the West that Iran should sign an additional protocol with the IAEA on sharper control of nuclear facilities. In addition, Moscow vowed to finish the Bushehr reactor only if Iran agreed to transfer the spent fuel to Russia. In 2006, Russia proposed forming a joint venture for nuclear enrichment or, more importantly, to transfer spent fuel to Russia for enrichment.⁹⁰ The latter proposal won international support as a way to ensure control over Iran's nuclear programme, but it would also put Russia in a caretaker position and bring Russia economic profit. Tehran showed some interest in the proposal but did not give up its own nuclear enrichment programme. Therefore, in December 2006 Russia supported a UN Security Council resolution which called on Iran to stop enrichment and imposed economic sanctions, which were relatively mild however, on Russian insistence. Additional sanctions were possible if Iran did not comply within 60 days.⁹¹ When Iran did not comply, Russia expressed displeasure. Russian officials warned that the Iranian nuclear programme could indeed acquire a military dimension and that Tehran was undermining Russia's international credibility. They also began to wonder why Iran needed nuclear power given its vast oil and gas resources, and were disappointed with the political development in Tehran.⁹²

Furthermore, Atomstroiekspor – the Russian company tasked to finish the Bushehr reactor by 2000 – repeatedly postponed the deadline for

⁹⁰ Freedman, p. 204.

⁹¹ Adomeit, p. 37.

⁹² *EDM*, No. 173, 20 Sept. 2006 No. 39, 26 Febr, No. 52; 15 March 2007.

sending the fuel rods with 100 tons of low enriched uranium and starting the reactor. Officials claimed that Iran was lagging behind with the monthly payments, and the company complained that the agreed sum (USD 1.2 billion) did not cover the mounting costs.⁹³ In addition, the Russian experts at Bushehr went home.⁹⁴ According to a Russian analyst, Tehran withheld payments in order to blackmail Russia into sending the reactor fuel, while Russia was pressing Iran to stop enrichment by withholding the fuel.⁹⁵

However, the primary reason for Russia's continuing delay was probably US protests and warnings. The Iranian authorities denied the charges of delaying payments and some Iranians even accused Russia of playing the Iranian card in order to ingratiate itself with the West.⁹⁶ On a visit to Iran, Putin assured his hosts that Russia would finish the reactor, apologised for the technical delays and reminded Iran of the agreement that spent nuclear fuel should be returned to Russia.⁹⁷ After a US intelligence report concluded that Iran had stopped its nuclear weapons programme already in 2003, which confirmed the official Russian view, in December 2007 Russia finally announced it had started to deliver nuclear fuel to Iran, repeating that this made the Iranian nuclear enrichment programme unnecessary.⁹⁸

By way of conclusion, Russian policy *vis-à-vis* Iran is thus clearly ambivalent, shifting and unclear. Russia tries on the one hand to nurture special relations with Iran in order to get political and economic benefits by expressing confidence in Iran's good intentions, opposing or trying to alleviate international sanctions against Tehran and advocating peaceful dialogue. On the other hand, Russia wants to stay on good terms with the US and the EU, which are worried by Iran's nuclear programme and its military implications, as well as Iran's hostile stance towards Israel. To some extent Moscow is therefore cooperating with the Western states in pressing Iran into concessions and participating in limited sanctions. Still, Russia probably prefers the present situation to any changes, since it can

⁹³ Adomeit, p. 36; *EDM*, No. 173, 20 Sept. 2006

⁹⁴ Maybe this was also a result of new signs that the Americans were preparing to attack the site.

⁹⁵ *EDM*, No. 52, 15 March 2007.

⁹⁶ Sanaie, p. 6, Adomeit, p. 34, Freedman, p. 211.

⁹⁷ President of Russia, "Interview with IRNA", 16 October 2007.

⁹⁸ The Moscow News, No. 50, 2007, *EDM*, No. 2, January 2008.

both profit economically from Iran and use it as a way to pose as a great power, when overall relations with the United States have soured.

Likely Russian reactions to an attack on Iran

Needless to say, Russia has long been carefully considering the likelihood of an American attack against Iran and warned against it. Most of the time, an attack has been regarded as unlikely, implying that Russia's Iran policy could continue. Former Prime Minister Primakov has stated that US threats to attack may be a way of enforcing discipline within NATO.⁹⁹

However, when signs of US preparations for an attack appeared, this received wide publicity in Russia. In March 2007, First Deputy Minister of Defence and Head of General Staff Yurii Baluevskii cautioned that the US might wound Iran but could not defeat it and that the war might lead to the 'downfall of America'. Deputy Minister of Foreign Affairs Andrei Denisov bluntly declared that a war close to Russia's borders would be unacceptable. A military specialist explained that although the Americans lacked conventional forces, this did not preclude an attack. Rather, it would force the US to use tactical nuclear weapons in the first wave of attack, which in turn could mean radioactive fallout on Russian territory.¹⁰⁰ This was of course seen as a threat.

The Russian reaction to an actual attack will naturally depend on its extent, timing and success. For instance, the use of nuclear weapons and/or high Iranian casualties would likely lead to stronger condemnations. The reaction will also depend on whether the attack is conducted suddenly and unexpectedly or after prior consultations which include Russia. The failure to predict a sudden war could lead to some soul-searching within Russian intelligence and Foreign Ministry offices, and those who predicted the attack would probably gain an advantage.

Domestic effects

Russia would most likely react very negatively to a US attack on Iran as a result of the prevailing mood of nationalism, great power thinking as

⁹⁹Primakov, *Moscow News*, No. 35, 2007.

¹⁰⁰ EDM, No. 66, 4 April 2007.

discussed above, and growing anti-Americanism due to NATO's eastern enlargement and the war in Iraq. Public condemnations would be made and more or less spontaneous demonstrations would be held at the US embassy in a similar way to when the Iraqi war started. Extreme nationalists would call for measures against US interests, consumer boycotts etc. and for solidarity with Iran. The attack could increase the already existing pressure on US companies working in Russia, for example in the energy sector. Had the attack taken place before the Duma elections in December 2007, it could perhaps have been used in the preceding campaign and have marginally contributed to the victory of nationalist pro-Putin parties, a victory which in any case was certain. It might also have paved the way for the security-orientated former Minister of Defence Sergei Ivanov to be elected the next president of Russia in March 2008.

The Russian military and security services, which have an disproportionate influence in society, would most likely strongly condemn an American attack and see it as an increased threat to Russian security. However they would also closely study how the attack was prepared, carried out and followed through in order to draw lessons. An attack carried out by sophisticated US weapons would most likely underpin arguments for more spending on defence and security, especially on air defence and C3I. This would be in line with developments in the aftermath of the attack against Iraq in 2003.¹⁰¹ Moreover, as noted above, Russia now has the economic means for such increased spending. Extreme Russian nationalists may call for support for Iran, e.g. by sending weapons or volunteers, or by breaking off diplomatic relations with the United States.

Effects on Russian foreign policy

Should an attack on Iran take place, this would mean that the Russian efforts at mediation and averting war would have failed and it would be more difficult for Russia to continue the balancing game between Iran and the US. The Russian leadership would most certainly desist from

¹⁰¹ Oldberg, "Ryska lärdomar av Irakkriget", *Internationella studier*, No. 4, 2003, pp. 25 ff, Carolina Vendil Pallin, "Iraq war prompts debate on Russian military reform", *Jane's Intelligence Review*, August 2004, pp. 54 ff.

supporting Iran in material ways against the US military as they did in Kosovo in 1999 and Iraq in 2003. The probable success of US high-tech weapons against Iran may also sully the reputation of Russian arms exports.

However, as hinted above, Russian officials are most likely to condemn an attack as evidence of general US aggression and disregard for international law. Moscow would especially criticise any US unilateral attack that had not been sanctioned by the UN Security Council (where Russia has the right of veto) in line with the previous cases of Kosovo in 1999 and Iraq in 2003. Unless Iran itself has admitted that it has, or is building, nuclear weapons (which is highly improbable), Russia may accuse the US of providing insufficient evidence to justify the attack. The likelihood of Russia making such claims has arguably increased in view of US misinformation with regard to Iraq's WMD programme. Russia also claims that the opportunities for negotiation and compromise have not been exhausted and refers to the example of North Korea.¹⁰² The US did not intervene militarily in North Korea even though Pyongyang made a point of having nuclear weapons, and six-party negotiations (which included Russia) in 2007 resulted in North Korea consenting to close its nuclear reactor in exchange for economic support.¹⁰³ The US may respond by lambasting Russia's arms exports to Iran and its contribution to Iran's nuclear programme. Thus, there are a number of reasons why Russian-American relations could deteriorate.

Russia may further argue that an attack will not split but rather unite the Iranians in their support of President Ahmadinejad and fortify his resolve to acquire nuclear weapons as a way of deterring attacks against Iran. Moreover, Russia may warn (if this has not already happened) that Iran can take countermeasures against US and allied interests in the Middle East, e.g. send troops into Iraq, support insurgence and terrorism in Iraq, Lebanon and against Israel, and disrupt traffic in the Hormuz Strait.¹⁰⁴

¹⁰² RIA Novosti, "Russia concerned by media reports of Iran military action – Lavrov", 18 September 2007, en.rian.ru/world/, retrieved 19 September 2007.

¹⁰³ Cf. Ministerstvo inostrannykh del Rossii, "Stenogramma otvetov Ministra inostrannykh del Rossii S.B. Lavrova", 30 May 2007, www.in.mid.ru, retrieved 14 August 2007.

¹⁰⁴ Such a scenario was commented upon by Primakov in *The Moscow News*, No. 35, 2007.

Doubtless, Russia would try to gain political capital from a US attack and take a leading role in restoring peace. Russian officials and media would pay much attention to human losses among the Iranian population, the material destruction and the environmental effects, especially any possible nuclear fallout, which could also affect neighbouring countries. Russia could well bring the issue to the United Nations, calling for a sharp international condemnation of the aggressor, an immediate cessation of hostilities and a renewal of negotiations, preferably under aegis of the UN. Russia could also initiate international humanitarian and reconstruction aid to Iran.

Along these lines, Russia would surely seek cooperation with like-minded countries in Europe in a similar way as it did in connection with the Iraq war in 2003. However, in the Iran case, both Germany and France, now with new leaders, seem to be closer to the US position than to Russia.

Russia will surely remind Europe and the world that after the destruction of Iranian nuclear facilities and military targets there will no longer be any need for a US-sponsored missile defence shield in Europe, especially the planned radar base in the Czech Republic and the missile base in Poland, which Russia sees as threats to itself. Russia will therefore demand that the US gives up the plans, something which in turn may worry the two base countries.

Russia could furthermore be expected to use an American attack on Iran as an argument for strengthening military integration in the Collective Security Treaty Organisation (CSTO), especially with regard to the joint air defence system and C3I.

Russia could at the same time profit from world attention on the new war by increasing its pressure on Georgia, which is striving to become a member of NATO. Russia has repeatedly carried out badly disguised military provocations and economic blockades against Georgia, even though these have rather tended to increase Georgia's efforts to join NATO. In addition, Iran's preoccupation with the war would make it easier for Russia to advance its positions with regard to the division of the Caspian seabed. Iran may also become too weak to compete with Russia for energy resources in Central Asia, for instance in Turkmenistan.

A US assault on Iran is furthermore likely to increase Russian cooperation with China, which is at least as concerned as Russia about US military presence and activities in its region. This, in turn, would probably boost security cooperation in the Shanghai Cooperation Organisation (SCO), which includes four Central Asian states but is dominated by Russia and China. The SCO would certainly condemn an attack on Iran, one of its observer countries.

A US attack on yet another Muslim country would also offer Russia an opportunity to improve its position in the Middle East, partly among its old allies such as Syria, partly among other Arab states, some of which are traditional allies of the United States. Several Arab states see Russia as a counterweight to the United States, one which they can use to their own advantage. Russia does not have any qualms about authoritarian regimes and has no ambitions to democratise countries. Russia has shed its atheistic Marxist-Leninist ideology and been accepted as an observer in the Organisation of Islamic States (OIS). It is willing to sell weapons to all states that are able to pay and is interested in cooperation in the energy sector, where it has vast resources and long experience. Accordingly, Russia has improved its relations with Saudi Arabia and Qatar. In February 2007 President Putin visited these two states as well as Jordan (immediately after having criticised the United States at a security conference in Munich) and signed economic agreements. Saudi Arabia was even offered cooperation in space research and a civilian nuclear power programme.¹⁰⁵

Finally, Russia would be one of the countries to benefit the most from rising oil and gas prices on the world market as a result of the war. With regard to Europe, Russia could boast that it is a stable, reliable and peaceful source of energy in contrast to the Middle East.

In short, an American attack on Iran would give Russia an opportunity to improve its standing and influence in world politics. This would be even more the case if the United States becomes bogged down in Iran, adding to its commitments in Iraq and Afghanistan, and if on top of that Pakistan succumbs to radical Muslim forces and breaks with the United States.

¹⁰⁵ Mark A. Smith, *Russia and the Persian Gulf. The Deepening of Moscow's Middle East Policy*, Conflict Studies Research Centre, Sandhurst, August 2007, p. 1 ff, Adomeit, pp. 8 f.

Russian relations with Iran

A US attack on Iran would mean that Russian efforts to mediate and support a country it calls a strategic partner had failed. Since Russia, as noted above, is unlikely to assist Iran materially in a war, the Iranians (and Russian extremists) would be disappointed and talk about deceit and Russian collaboration with the US. The attack would also mean at least a temporary halt to Russian exports of arms and nuclear technology to Iran, even though the resulting financial losses should not be exaggerated.

However, unless the war led to the fall of the Islamist regime in Iran, which is very uncertain, the regime would probably try to recover its strength as soon as possible. Even if Iran might have felt deserted by Russia during the war, it would not have many options but to turn to Russia for support (though China could emerge as a stronger competitor than before). As noted above, Russia is likely to condemn the attack on Iran on the international arena and would probably be very keen to recover its position in Iran, e.g. by promoting reconstruction there. Out of international considerations Russia may have to keep out of Iran's nuclear sector, thus forfeiting profitable contracts, and also refrain from exporting offensive weapons to Tehran. However, Moscow can be expected to intensify its efforts to gain a strong position in the Iranian energy sector by taking over Iranian companies and making investments. Iran would then be in a weaker position *vis-à-vis* Russia than before the war and less able to compete with it, for example in Central Asia.

Thus, Russia has probably been Iran's strongest ally since the 1990s and profited from the cooperation without having worried about Iran's nuclear programme or military and political ambitions, in contrast to most Western states. Even if Russia were to suffer some economic losses from a US attack on Iran, it could also score political points on the international arena at US expense and both retain and expand its economic and political relations with Iran after the war. Russia may thus be in a win-win situation.

References

Adomeit, Hannes: "Russlands Iran-Politik unter Putin", SWP-Studie, April 2007/S 08, 44 pages. Berlin: Stiftung Wissenschaft und Politik.

Cf. Ministerstvo inostrannykh del Rossii (*The Ministry of Foreign Affairs of Russia*): "Stenogramma otvetov Ministra inostrannykh del Rossii S.B. Lavrova", 30 May 2007. Source: www.in.mid.ru

Dagens Nyheter: 17 Oct. 2007. Stockholm: Bonnier.

DEBKAfile: "Iran buys 250 long-distance Sukhoi fighter-bombers, 20 fuel tankers, from Russia". 1 August 2007. URL: debka.com/headline_print.php?hid=4449

EDM (Eurasia Daily Monitor): No. 66, 4 April 2007. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 2, January 2008. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 173, 20 Sept. 2006. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 39, 26 Feb 2007. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 52; 15 March 2007. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 181, 1 Oct. 2007. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 125, 27 June 2007. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 73, 14 April 2007. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 152, 7 August 2006. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 5, 8 January 2007. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 12, 17 January 2007. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 124, 26 June 2007. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 192, Oct. 2007. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 194, 19 Oct. 2007. Washington D.C.: Jamestown Foundation.

EDM (Eurasia Daily Monitor): No. 27, 7 February 2007. Washington D.C.: Jamestown Foundation.

Freedman, Robert O. (2007): "Russia, Iran and the nuclear question: The Putin record", in Kanet, Roger E.: *Russia: Re-Emerging Great Power*. Basingstoke-New York: Palgrave Macmillan. 2007.

The Moscow News: No. 50, 2007,

Oldberg, Ingmar: "Russia's Great Power Ambitions and Policy" and other chapters in Kanet, Roger E. (ed.): *Russia: Re-Emerging Great Power*. Basingstoke-New York: Palgrave Macmillan. 2007.

Oldberg, Ingmar: "Ryska lärdomar av Irakkriget", *Internationella studier*, No. 4, 2003, pp. 25-29. Stockholm: Utrikespolitiska institutet.

Oldberg, Ingmar: *The Shanghai Cooperation Organisation: Powerhouse of paper tiger?*, FOI-report (FOI-R—2301—SE), June 2007. Stockholm: FOI.

Oldberg, Ingmar. *The War on Terrorism in Russian Foreign Policy*. FOI-Report (FOI-R—2155—SE), December 2006. Stockholm: FOI.

President of Russia: "Interview with IRNA Information Agency", 16 Oct 2007. URL:

<http://www.president.kremlin.ru/eng/text/speeches/2007/10/16/1450>

President of Russia: "Press conference following the end of the G8 summit", 8 June 2007. URL: www.president.kremlin.ru/eng

President of Russia: Speech and the following discussion at the Munich Conference on security policy, 10 February 2007, URL:

<http://www.president.kremlin.ru/eng/text/speeches/2007/02/10/0138>

President of Russia: "Speech at the opening of the Second Caspian Summit", "Answer to a question", 16 Oct 2007.

Primakov, Yevgeny: *The Moscow News*, No. 35, 2007.

Primakov, Yevgeny: "US-Iran: bluffing or going for broke, *The Moscow News*, 13 September 2007.

Putin, Vladimir: "I do not rule, I simply do my work". *International Affairs*, No. 2, Vol. 53, 2007. Minneapolis and Moscow: East View Information Services

RIA Novosti: "Russia concerned by media reports of Iran military action – Lavrov", 18 September 2007. URL:
<http://en.rian.ru/world/20070918/79302439.html>

Sanaie, Mehdi: "Problems and prospects of Iranian-Russian relations", *Russia in Global Affairs*, No. 3, 2007, pp. 171-181. Moscow: Global Affairs.

Smith, Mark A.: *Russia and the Persian Gulf. The Deepening of Moscow's Middle East Policy*, August 2007. Sandhurst: Conflict Studies Research Centre.

Svenska Dagbladet, 17 Oct. 2007.

Vendil Pallin, Carolina: "Iraq war prompts debate on Russian military reform", *Jane's Intelligence Review*, August 2004.

Chapter 6. Security Policy Consequences for Europe, the EU and NATO

Peter Haldén

Background

A US strike against Iran would present an ambiguous challenge to Europe. It could, on the one hand, have few consequences for the cooperation within EU and NATO but could, on the other, lead to a tense and possibly destructive situation. This is in many ways similar to the diplomatic crisis preceding the Iraq war of 2003. Developments will to a large extent depend on how the situation is managed, which is why it is of interest to examine the developments leading up to and during the Iraq war.

The question of whether the US would, or would not, attack Iraq resulted in rather serious diplomatic disagreements, originally because several NATO and EU member states turned it into an issue on which 'Europe' should have a common position. Thereby, instead of keeping differences outside the common framework, they were brought inside and were intertwined with ongoing conflicts regarding other EU/European matters. This process exacerbated differences substantially and caused a crisis in and for the EU.

In the beginning of 2003, France framed the question of the legitimacy of a US invasion of Iraq as an issue on which the EU had, or should have, a common position, implying that it was that of France and Germany. This led to reactions from Britain, Denmark, the Czech Republic, Hungary, Italy, Poland and Spain, all of whom declared loyalty to the US by underlining the shared community of values. The process continued in a diplomatically destructive circle where both sides either made references to the 'EU' or 'Europe' in order to bolster their position on the Iraq issue as well as to undercut that of their opponents. The mutual use of 'Europe' in a struggle which, in essence, had little to do with the EU became problematic for all parties since it forced the protagonists to take ever tougher stances since their national positions in and on Europe became threatened. Before the outbreak of the war in March 2003, the tone of the

debate became notably sharp, especially between France and the prospective EU member countries in Central Europe, but also between France, Germany and Britain.

The crisis was also played out in NATO, beginning in February 2003 when Turkey activated Article IV asking NATO for a missile defence system as protection against possible Iraqi attacks. Belgium, Germany and France refused the request, which led to sharp reactions from the US. The situation was finally resolved by taking the decision in a committee of which France was not party, while Belgium and Germany were co-opted. However, the crisis within NATO added to the already tense diplomatic situation.

With hindsight it is clear that no permanent damage was done to the EU or NATO, but this should not lead us to disregard the explosive potential of this crisis, and hence any crisis with similar features. France considered the situation very serious. The crisis was judged to be “the worst transatlantic crisis since the creation of NATO”.¹⁰⁶ Needless to say, such a course of events – especially under the acrimonious circumstances of the time – would have had profound consequences for Europe’s security and political architecture.

Why did the Iraq crisis become so serious? One of the most salient features of the Iraq crisis was that it was a very public and prolonged process. The preparations leading up to the war and the process taking place in the United Nations Security Council gave EU/NATO member states the opportunity to take a stance, and in several cases forced them to do so. The drawn-out process also meant that public opinion in member countries could be mobilised, with or without the support of governments. The notable material (i.e. economic) interests in Iraq of certain member states also played a part in increasing the stakes. However, French ambitions to increase France’s standing in the Arab world were a factor in relation to Iraq that will be irrelevant in relation to Iran, since it is not an Arab country.

The Iraq crisis has been described as a question of ‘settling scores’ between member states of the EU, especially pertaining to issues

¹⁰⁶ Fabian Terpain: *France and the European Security and Defence Policy*, Paper presented at the EUSA Biennial Conference, Austin, Texas, 31 March (2005), p. 10

connected to the proposed EU constitution. In short, many countries had grown tired of, and were provoked by, the leadership role to which France and Germany had implicitly aspired. For these states Iraq presented itself as an opportunity to demonstrate that the two could not hope to further strengthen the leadership role they sought. The incoming East European members of NATO and EU were also upset by the fact that France and Germany acted together with Russia, their former oppressor, against the United States.

Consequences/Possible courses of action

The risk of a US strike against Iran resulting in deep diplomatic rifts and conflicts – which could result in serious repercussions – decreases dramatically if no-one involves the EU, ‘Europe’ or NATO.

Compared with the time of the Iraq events, the domestic settings have changed and there is less pressure on governments to position themselves strongly in favour of or against the US. Before the 2003 war there was a considerable ‘anti-war’ movement, which put pressure on governments and in some cases resulted in conservative governments (i.e. Spain) feeling more convinced about their case. In both France and Germany public opinion was co-opted, and both governments profited from it, regardless of the French government being right-wing while that in Germany was left-wing. By contrast, in Italy the protests were to a high degree mixed with opposition to the government.

One factor that is different today compared with the situation in 2003 is that the major countries are governed by very different leaders. Above all, Gerhard Schroeder and Jacques Chirac, two leaders with marked tendencies for – frankly put – populism and opportunism, have departed, which reduces the risk of sudden actions that could widen disagreements within the EU. Furthermore, Spain’s former Prime Minister Jose Maria Aznar and Italy’s former Prime Minister Silvio Berlusconi – both of whom were quite confrontational – have instead been replaced by markedly more pragmatic leaders.

The situation in some key member states

The actions of one single EU member will not cause a crisis. Instead, the potential for crisis depends to a large extent on the tendency of a country to take an uncompromising stance and the willingness of others to 'take the bait'. However a decisive factor, as mentioned above, is whether any country starts to claim that the EU should have a common position, as this might worsen existing disagreements. Single countries can thus act and react strongly without triggering a crisis within Europe or the EU.

In general, many countries can be expected to condemn an attack on Iran, depending on the extent to which they have been consulted and on how developments leading up to war unfolds. One variable which has already been mentioned is the degree to which the question is debated in the UN. Lengthy deliberations in the UN can force the Europeans to take a stance and also give them the opportunity to take a stance. Thus, the risk for conflicts within the EU can increase.

Britain

Britain is probably the country whose position is the least difficult to predict, partly as it relatively consistently stands on the same side as the US and partly as its leadership is kept informed by the Americans. This means that they have no reason to feel neglected. However, on a number of occasions, Prime Minister Gordon Brown has shown himself to be inclined to distance himself from the US in terms of foreign policy in general and Middle Eastern issues in particular. This has been demonstrated in meetings with President Bush, as well as in the decision to withdraw British troops from Basra.

It must be stressed that Prime Minister Brown's less amiable position toward the US stands out because of the marked contrast with his predecessor. An uncertainty remains concerning to what extent Gordon Brown is ideologically driven. While Tony Blair showed that he was willing to fight for something he believed in, it appears that Brown is more pragmatic and thus less likely to initiate ideological polemics with other European leaders on foreign affairs.

Germany

Since 2005 Germany is governed by a coalition government headed by the conservative party leader Angela Merkel. She has made a conscious

effort to repair relations with the United States, while somewhat cooling the cordial relations that her predecessor Schröder upheld with France and Russia. In cooperation with the United States, Germany has been one of the three EU states trying to press Iran to fulfil all UN and IAEA conditions with regard to nuclear issues.

However, the Merkel government has to consider its Social Democratic coalition partner, which holds the foreign ministry. Thus, in relation to Iran, Germany has called on the USA to have a direct dialogue and has advocated peaceful solutions and positive offers that take Iranian dignity into account.¹⁰⁷ Furthermore, a certain amount of irritation can currently be sensed in the German government over the American plans for a missile defence system, of which parts are planned to be installed in the Czech Republic and Poland. Berlin is mainly irritated that there has been a bilateral agreement between the countries concerned that has not gone via NATO. This irritation, which essentially originates in a worry about the cohesion of NATO, could also manifest itself in the event of a unilateral attack against Iran. Berlin does not want a NATO operation but they will be displeased if an attack is launched without due consultation. In a general sense, Chancellor Angela Merkel's pragmatism and search for compromise are likely to act as a moderating force in the EU.

France

Even after the presidential elections, the French reaction to an eventual attack on Iran remains uncertain. In 2007, the new president Nicolas Sarkozy stated his determination to stop Iran from developing nuclear weapons by saying that the world faces two alternatives should sanctions fail, 'an Iranian [nuclear] bomb or the bombing of Iran'.¹⁰⁸ Sarkozy also differs from his predecessor Chirac in that he comes across as more pro-American. This assessment to a large degree rests on the President's highly visible and symbolic acts of non-confrontation and realpolitik. These facts seem to indicate that Sarkozy would support strikes against Iran. However, certain conditions would probably have to be met, such as France having been consulted beforehand or the option of sanctions having been exhausted. The former condition would most likely be the

¹⁰⁷ *Der Spiegel*, No. 7, 2006, p. 25.

¹⁰⁸ Elaine Sciolino: "Iran risks attack over atomic push, French president says", *IHT*, August 27, (2007)

most important. So, wherein lies the uncertainty? Since President Sarkozy has made his mark as a highly activist politician, he will probably want to play a part, at least diplomatically. A sign of this is also Sarkozy's round trip to Arab states in early 2008 and his decision to establish a French military base in the United Arab Emirates.

Although President Sarkozy might support an attack on Iran, this may not apply equally to all members of the government, most notably Foreign Minister Bernard Kouchner, who is unlikely to be supportive of an action that lacks widespread legitimacy, preferably provided by the UN. Failing that, a wide international consensus such as that secured for the NATO intervention in Kosovo could be sufficient. These conclusions are entirely based on Kouchner's previous political and professional record as a UN administrator in Kosovo and advocate of removing Saddam Hussein. Being a staunch advocate of humanitarian intervention, Mr Kouchner might perceive a preventive strike as rendering it more difficult to make such interventions a feature of the international system.

Poland

The two characteristic traits in Polish foreign policy during the past few years have been a strong pro-American stance and, under Jaroslaw Kaczynski's coalition government, strong skepticism against everything connected with Germany. Poland welcomed a US military base against possible Iranian missiles, which could also serve purposes against Russia if the need arose.

However, the tension *vis-à-vis* Germany was lessened by Chancellor Merkel's efforts to maintain good neighbourly relations. Furthermore, the extraordinary parliamentary election in October 2007 resulted in the coming to power of a new coalition government led by the liberal Donald Tusk, who started to repair relations with Germany and Russia. On the other hand, the new government was no less pro-American than the former and continued to prepare for a US missile base, while Jaroslaw Kaczynski's twin brother Lech stayed on as president. Poland can also be expected to avoid conflicts and seek compromises with its allies in NATO and the EU in the event of a US attack on Iran.

Spain

The greatest difference in Spain today compared with four years ago is that former Prime Minister Jose Maria Aznar was much more confrontational than his successor, José Luis Zapatero. Prime Minister Zapatero decided to pull back Spanish troops from Iraq, which can be interpreted as a willingness to protest against interventionist US policies. However, it is also plausible that he is keeping a lower profile in general in the field of foreign policy. Together with his pragmatic stance, this will probably mean that he would protest against an attack on Iran, albeit not very loudly. Two outstanding uncertainties remain: Firstly, his low ratings in the polls, which could either make him less inclined for 'partisan' initiatives such as protesting against an American attack or tempt him to secure his position among his core (left-wing) electorate by doing so. Secondly, the fact that he has proved himself to be in possession of no small amount of political courage, for example in dealing with ETA, indicates that he may support an 'anti-war' cause, should war come to Iran.

Italy

In Italy, Prime Minister Romano Prodi will probably either avoid taking a strong stance since he is anxious to fulfil obligations as a loyal member of NATO – an issue which he recently fought for in the parliament as well as the Senate, or he might make some sharp, but non-committal, statements in order to satisfy his left-wing coalition partners. Either way, he will probably be less active than Berlusconi was in the crisis of 2002-2003. PM Prodi could plausibly be grateful if the extreme left-wing of his coalition again were to cause the government to fall given speculations that his aim seems to be to create a government with a stronger centrist-base.

Timing

Compared with the 2003 Iraq war, the present situation on the whole seems to be a fairly advantageous time for the US to strike against Iran in terms of avoiding a major conflict among its NATO partners. The EU is also in a much calmer, some would say stagnant, period now compared with the time of the Iraq crisis, preoccupied as it is with absorbing the 10 new member states and solving the constitutional crisis by a reform treaty. Currently, there are not as many disagreements within other

policy areas that could potentially 'spill over' and make the positions of the respective member states *vis-à-vis* a US strike more infected.

Factors of uncertainty

A number of factors introduce a considerable element of uncertainty that lies in the difficulty in foreseeing whether they will occur or not. What unites them is that they can substantially influence the situation in Europe/the EU/NATO either by cooling down or heating up the conflict.

Factors that could contribute to resolving difficulties:

- The Iraq crisis was traumatic and no-one wants to see it repeated. In fact, there are signs of 'institutional learning' having taken place, which will work towards avoiding a new conflict.
- All the states, even Poland, want to solve the EU constitutional crisis by bringing the process of adopting the reform treaty to a successful end in 2009 without bringing in disruptive issues.
- Factors that could contribute to worsening the conflict:
- If the acrimony generated by the Iraq war is still sufficiently strong, a US military action could be perceived by the general public, if not by governments, as a repeated mistake.
- How the rest of the world, primarily the Middle East and Russia, reacts.
- If any of the EU countries were to participate in the attack. The only countries with the capability to do so are Britain and France. However, such a scenario is deemed unlikely.

Most governments and citizens of the EU are assumed to prefer that an attack does not occur and that if it does, they will not unconditionally support the attack – with the possible exceptions of Britain and Poland. However, most governments do not support the idea of Iranian nuclear weapons – in fact, this is a real concern to a number of them. Therefore, tacit support might originate from governments that are outwardly seen to be issuing protest statements, such as France.

Politically, it is interesting to consider the extent to which public protests could be controlled. One factor which could definitely move political

leaders as well as public opinion in a more negative direction would be a critical reaction from the rest of the world. One example is Germany where the government at the moment, especially the SPD coalition partner, is anxious to secure a good relationship with Russia. This can be seen with regard to the question of access to secure energy imports from Russia, as well as the US plans to station parts of its missile defence system in the Czech Republic and Poland. If the Russian reaction to an attack against Iran were to be strongly negative, it is plausible that Germany would take a more critical position. That, in turn, could again worsen its relations with Poland and the Czech Republic.

A considerable factor of uncertainty is whether anyone will involve NATO in the diplomatic game. Something that would definitely increase tensions within the alliance would be if Turkey were to activate Article IV as it did during the Iraq crisis.

An important issue that could polarise the EU as well as NATO would be if the US publicly seeks the support of European states. In 2002-03, the US did so in a very blunt and overt way, diplomatically rewarding allies and punishing 'malcontents'. Effectively, this proved to be tantamount to a strategy of 'divide and rule' which was destructive to European cohesion since if the worst comes to the worst, most European countries will side with the United States, which they view as their security provider of last resort.

Last, but certainly not least, official and public reactions to an attack on Iran would most likely be different if the US were to use nuclear weapons, which would be unprecedented in the post-WWII period. Public opinion in many countries, especially Germany, France, Italy and Spain, but also Britain, would most likely react very negatively.

Evolution of modern warfare, operational art, military strategy

An attack on Iran could have an impact on a range of issues but the precise consequences ultimately hinge on its success. An attack would probably primarily consist of air strikes, possibly with special forces and/or Rangers conducting minor operations on the ground. If successful, the hypothetical attack on Iran would reinforce the trend towards emphasising these two elements as key assets, on indeed the primary

assets, in Western forces. If the attack either failed to reach its objectives or if it suffered too many casualties, it could discredit, but probably only slightly, the aerial-special forces approach to warfare. Another interesting question is whether the outcome will strengthen or weaken the conception that no-casualty warfare is realistic for Western forces, as it has been since the first Iraq war in 1991.

An attack on Iraq, which the US would attempt to justify by arguing that it is a preventive attack, would be seen very much as a war of choice. If the attack were to be a success, then the US political sphere and possibly some European counterparts could come to accept the strategy of preventive war as more legitimate. If this occurs, then the status of the military instruments associated with this strategy, i.e. air force and rapid deployment troops – probably with a strong Special Forces component – would also increase. This in turn might influence decisions on European force structures.

Grand narrative, religion, hearts and minds

European reactions to an attack on Iran are made less complicated by the fact that the Iranian communities in European countries mostly, but not exclusively, have a dissident background. This means that they are unlikely to come out in support of the regime in Tehran and demonstrate their discontent, either in the streets or at the polls. However, it remains an open question whether feelings of 'patriotism' and factors such as family connections, and hence outrage at an attack, would outweigh any support for a strike against the Islamic regime.

Another question equally open and important is whether air strikes against Iran would be cast as an attack on Islam. Tehran would likely pursue this strategy to curry support, and Moslems in the West might also perceive an attack on Iran in this way. Whether such perceptions would result in political mobilisation is very difficult to gauge. One possibility is that an attack could fuel radicalism. Another is that extremists planning or carrying out a terrorist attack, which they would have carried out in any case, might use an assault on Iran to justify such an attack. If a terrorist attack, motivated by an attack on Iran, were to occur, then public opinion in the affected country (but probably less in other European countries) would react negatively. Most probably,

discontent would be directed at the incumbent government, which would be punished at the next election.

Environmental consequences

A US air strike on Iran would have tangible environmental consequences on Europe if radioactive particles unleashed by the strikes were to be carried by winds into European territories. Although the possibilities appear slight, should this occur then the consequences would be public outrage in any European country, forcing the government to take a stance against the US campaign. This issue is more likely to lead to the mobilisation of Europe-wide public opinion than terrorist attacks in a European country. This assumption is based on the fact that environmentalism and opposition to nuclear energy and nuclear weapons created Europe-wide social movements in the 1990s, whereas the terrorist attacks in Madrid and London did not lead to public reactions on a European level. Both kinds of events would probably have effects on a European level but would hardly be divisive among the EU countries.

Humanitarian aspects

Massive civilian casualties and destruction of civilian property is a factor that is likely to influence political and public opinion in Europe. This is particularly pertinent if civilians were to be affected by radioactive contamination. A situation where the US is causing damage to civilians through radioactivity in combination with a bombing campaign would be very difficult to handle from a PR point of view. In such a scenario, public opinion in certain countries, e.g. France, Greece, could render political cooperation with the US, particularly in the fields of security and defence, politically costly.

References

Der Spiegel: No. 7, 2006

Sciolino, Elaine: "Iran risks attack over atomic push, French president says", *IHT*, August 27, (2007)

Terpain, Fabian: *France and the European Security and Defence Policy*, Paper presented at the EUSA Biennial Conference, Austin, Texas, 31 March (2005)

Chapter 7. Some consequences from a US perspective

Fredrik Lindvall

World trade and economy

The initial phase of an American military engagement would probably not result in much turbulence on the economic markets, e.g. oil prices, but after a day or so the situation could become more volatile. Pricing always includes risk calculations and the market would most probably have priced-in a military confrontation prior to an attack. An experience from Operation Iraq Freedom was that the price of oil did not go up as much as the market had anticipated. Since then, the Iranian nuclear programme and related international tensions have been an integral part of market calculations. A limited market effect would be even more likely if the operation appears brief, precisely executed and with a clear 'oil industry protection' design. The initial part of the attack would probably go to plan, but after a few hours or a day a more threatening or uncertain situation could emerge. If the Iranian reaction were to entail actions that the US forces have not foreseen, or have problems with handling, then large effects on the market are likely, primarily in related areas such as the price of oil and shipping insurance.

Top trades in the event of an attack on Iran

- Currencies: **Buy CHF, Buy NOK; Sell TRY**
- Commodities **Buy Oil and Gold; Sell industrial commodities**
- Equities: **Outperform Oils, Lukoil, Gazprom; Sell Turkey, Israel**
- EM Bonds: **Russia/Kazakhstan – Outperform; Sell Turkey/Iraq**
- Developed Bonds: **Buy 5-yr US paper, Buy Euro 10*10-yr volatility, Sell Itraxx Main**

Source: *Attacking Iran*, ING Bank London Branch Research 2007

The economic effects on the US would probably be small in the short and medium-term perspective due to the size and self-reliance of the American economy with e.g. its large oil reserves. Long-term consequences could be more profound, e.g. if the insurance rates and oil prices were to increase and remain higher for an extended period (years) or if there were to be a long lasting depreciation of the US dollar.¹⁰⁹

The direct effects in the American military budget would probably be insignificant. Additional operational costs for a 48-hour campaign would mainly stem from extra ammunition and fuel. The extra costs of reinforcements or having ground troops in Iraq on high alert would arguably be hard to separate from extra costs linked to the already implemented surge in Iraq of 2007. The long-term costs are harder to predict and depend on what follow-on strategy Washington would choose. If the US were forced to commit as many resources as it did in Iraq, e.g. to sustain no-fly zones, there could be more substantial economic effects with political implications.

International politics and great power relations

From an American perspective, a key in assessing multilateral institutions is determining their instrumental usefulness.¹¹⁰ The international political situation prior to an attack on Iran would have a significant impact on how the US regarded the UN and international law. Either Washington will find the UN and multilateral cooperation useful or the multilateral approach will be seen to be counterproductive. A crucial factor would be how much support or legitimacy the US would manage to secure through a multilateral process prior to an attack. Such support and legitimacy would not have to mean that the attack needs to be strictly in accordance with the UN charter, but that a significant number of US allies and

¹⁰⁹ *Attacking Iran - The market impact of a surprise Israeli strike on its nuclear facilities*, ING Bank London Branch Research (2007): . "The US dollar, government bond yields, stock markets and industrial raw materials would all fall. Oil and gold prices could spike, boosting related equities, debt and currencies. The duration of these effects would depend on the extent of Iranian retaliation: A constrained response would make them short-lived".

¹¹⁰ One way to explain 'Instrumental multilateralism' is that the US before multilateral engagement makes a careful cost-benefit calculation. This is the main argument in *US Hegemony and International Organizations*. Rosemary Foot, S. Neil MacFarlane and Michael Mastanduno, editors. Oxford University Press 2003.

partners find military action acceptable. A more resentful American attitude towards the UN would evolve if the multilateral process looks like a rerun of the UN Iraq debacle in the beginning of 2003. The costs of choosing the multilateral approach would include aroused world opinion and a lost opportunity to fully take advantage of the element of strategic or military surprise. This stands in contrast to the military success and political ease of the Israeli attack on Osirak in 1981.

US relations with Iran's neighbours could be tilted in an unfavourable direction, especially if the attack looks like a continuation of a regional transformation strategy. A key determining factor is how US intentions are perceived by the states in the region and whether a US attack is believed to be an act to restore the status quo or to reshape regional dynamics. Some allies and partners, like Turkey and other states bordering Iran, would have a problem with an American reform agenda. The Ankara-Washington relationship has been under stress for some time and Turkey could then drift further from the West towards Iran, Syria, Russia and China.¹¹¹ However, if a US attack is viewed as an act to restore the balance of power, the regional reaction would probably be more tolerant. This would be even more likely if the US policy towards Iran seems to be in concert with an Iraqi strategy, with prospects of domestic stability in Iraq.

The US will try very hard to prevent the development of an Arab/Sunni nuclear bomb, which is a potential reaction to Iranian Persian/Shiite nuclear ambitions. A successful attack against the Iranian nuclear programme would not necessarily halt regional attempts to acquire strategic weapons. Regional dynamics could instead arguably spur interests in WMD. Operational WMD capability would offer an interesting option for Tehran and others as a viable deterrent against future Western aggression, while because of the deep political, religious and ethnic tensions that characterise intrastate relations in the Middle East, rivalry and struggles among the regional powers to get the upper hand, also in the military arena, will continue. Washington would need to balance the regional powers by its own military capabilities and by strengthening allies. Such a policy would entail a long-term US military

¹¹¹ For a more comprehensive discussion of the dynamics of Turkey relations see "The US and Turkey: End of an Alliance?" in *IJSS Survival*, vol 49 nbr 2 summer 2007, p. 135ff.

presence in the region, the indirect shield of the US nuclear umbrella, in combination with extensive sales of (preferable defensive) military equipment to allies in the region.

Humanitarian aspects

There could be indirect humanitarian aspects affecting Washington. An attack on Iran could trigger Tehran to broaden its support to the insurgency in Iraq. A more violent development in Iraq could ignite larger refugee flows and complicate US ambitions in Iraq and its relations to allies in the Middle East.

The evolution of modern warfare and military thinking

An American attack on Iran would re-establish US supremacy as the most lethal military in the world. This would be especially true if some of Iran's more modern Russian defence systems, e.g. SAMs such as the SA-15 or the S-300/400, perform badly when engaged by the US military. It is hard to imagine that Iran could put up any effective defence to stop or even affect the American attack. If the ground raids launched from air and sea were to be successful, the 'Rumsfeldian' way of high intensity warfare would most likely gain support. Small raiding units or Special Operations Forces (SOF) supported by air assets, causing havoc among traditional conventional enemy forces (such as the Talibani and Iraqi regular units) have been one of few encouraging military experiences from the campaigns in Afghanistan and Iraq.

The Western view, and particularly the Washington perception, of the usefulness of (kinetic) military action could be influenced by an attack. In an evaluation, key determinants would be the effect on the target, collateral damage, US casualties, the sum of resources needed, etc. Whether that calculation will yield a favourable result is far from certain. In particular, a net assessment from a political point of view, including political costs and benefits, could find it hard to get clear-cut conclusions concerning the utility of military violence. Provided that the first phase of the operation goes according to plan and is followed by a credible follow-on concept, e.g. no-fly zones to stop further Iranian nuclear aspirations,

then military attacks would gain credit in parts of the security policy establishment.

Whichever result the attack would bring and whichever moral implications one would derive from it, a typical conclusion would be that US precision weapons and high quality intelligence are of the essence in any war for Western participants. The political incentives to use nothing but the latest high performance weapons have been very strong since the Gulf War of 1991. There is a considerable political cost attached to any decision not to use the latest high-tech precision weapons, which can reduce the risks for one's own military and minimise unwanted consequences for civilians and the enemy.

There are at least two Iranian military postures that could pose great challenges for the US and the international community – one violent and one non-violent. The most likely Iranian response would be asymmetric in character. This could involve indirect military action and/or clandestine irregular operations, e.g. the indiscriminate use of missiles and diesel-electric submarines against civilian targets and the use of proxies in other geographical arenas, for example using Hezbollah to target Western interests outside Iran. Whether a violent asymmetric approach would cause severe problems in the West and set the Middle East ablaze¹¹² could be questioned. It is not self-evident that Tehran would be able to convince its allies to aggressively pursue an Iranian agenda that would undoubtedly expose them to criticism and Western security services. Another more unlikely but potentially more potent Iranian response would be for Tehran to exercise a non-violent, strictly diplomatic approach. Attempts on the part of Iran to isolate the US internationally with statements and media events while at the same time refraining from using military means could generate more profound problems for Washington. Pictures of civilian casualties and condemnations of Muslim neighbours who are facilitating US military attacks would be an expected Iranian reaction. A battle in the 'soft power arena' of the Middle East could alienate Western allies and stable regional partners, such as the Europeans and Turkey, from the US, and at the

¹¹² For one of many dark prognoses see IRAN'S NUCLEAR PROGRAMME AND REGIONAL SECURITY p. 4f, by Dr. Farhang Jahanpour OxfordResearchGroup April 2007.

same time undermine the more unstable US regional friends, such as the small Emirates in the Persian Gulf.

References

Jahanpour, Farhang: "Iran's Nuclear Programme and Regional Security". Briefing Paper, April 2007, Oxford Research Group. London: ORG.

"The US and Turkey: End of an Alliance?". *IISS Survival*, Vol. 49, No 2, Summer 2007, pp. 129-144. London: Routledge.

Part 3. Functional Assessments

Chapter 8. Iran – Global economic consequences of an attack

Johannes Malminen

This chapter begins with a brief discussion of the connection between geopolitical events and global economic development, and then argues that a limited attack on Iran's nuclear facilities is not very likely to have a direct impact on the global economy, primarily due to Iran's economic isolation. The main risks for a serious impact on the global economy lie in the timing of strikes and Iran's response to the attacks.

Geopolitical events and the global economy

The world economy has been impressively resilient to economic and political shocks over the past decade, and so far no geopolitical event has been able to slow its growth. As journalist Martin Wolf puts it, "the underlying engine of the world economy is immensely powerful."¹¹³ The world economy has not suffered a major recession for many years now, although some major economies have had problems of slow growth, contraction, or even temporary recession. Neither economic shocks, such as higher prices for natural resources, financial crises (dot-com bubble) or economic stagnation and restructuring (Japan, Germany), nor geopolitical events, such as the 9/11 attacks and the wars in Afghanistan and Iraq, have seriously hampered the overall performance and positive growth of the world economy.

While a great deal of time, money and brainpower has been spent on the Global War on Terror (GWOT), most of the places where it has been fought have been far from the hubs of the global economy. Civil wars, such as the conflicts in the Balkans and Africa, tend to happen in weaker states that do not have an important share in, or connection to, the global economy. The same goes for wars-by-proxy or traditional interstate wars,

¹¹³ Martin Wolf, "Globalisation's Future Is the Big Long-Term Question," *Financial Times*, 9 January 2007.

such as the conflicts in the Middle East and Caucasus. They are all located far from the centres of the global economy. The human suffering and the local and regional implications of the conflicts have so far not transferred into a negative development for the aggregated world economy. Instead, after initial shocks, the often grinding, low-intensity conflicts become rather insignificant features in the regular operation of the world economy.

On the other hand, when geopolitical events have taken place in the very centre of the global economy, such as the bombings in New York and London, they have been sudden terrorist acts with far worse psychological than physical effects on the world economy. Although these strikes targeted the world's pre-eminent financial centres – the very symbols of global capitalism – there have only been limited long-term effects on the operation of the world economy. Although the US financial markets were closed for more than a week after the 9/11 attacks, they soon resumed their positive development, albeit from a much lower level.

What usually happens in the aftermath of terrorist attacks is that the acute uncertainty increases the political and market risk premiums demanded in the markets. In order to reduce the risk premiums and resume their normal operations, market actors seek the answers to questions such as: 'Who is attacking?', 'Will there be more attacks?' and 'Will they have a substantial and lasting impact on the behaviour of other economic actors?' The answers to these questions must be reassuring, and as the understanding of the implications increases, the risk premiums demanded go down, volatility decreases and market actors return to a state of business-as-usual. To date, neither the intense uncertainty about the consequences, the damage to the economic infrastructure, nor the mistrust in the operation of the economy due to terrorist attacks have been significant enough to upset the development of the aggregated global economy. The development of the global economy has continued unabated once the dust and fear have settled in the aftermath of terrorist attacks.

The global financial market reaction to terrorist attacks or other geopolitical events has diminished after the 9/11 attacks. One obvious reason is of course that there have not been any further attacks on the same scale. The 9/11 attacks shook the foundations of the global financial

system, which is an integral part of the global economy. However, there also seems to be a learning effect in that subsequent bombings have had a much smaller impact on the overall economy.¹¹⁴ Rather than being a surprise, terror attacks are now factored into the equation. Terrorist acts at the very centres of the global economy are no longer unknown unknowns, but known unknowns, to use Donald Rumsfeld's now famous terminology. As a consequence, new attacks are met with less surprise and uncertainty. The downside is that the normalisation of terror attacks sets the bar higher for future terrorists. Thus, in order to bring down the operation of the world economy, terrorists will have to bring their attacks to increasingly higher levels of coordination and devastation.

Set against these general points on the connection between geopolitical events and the global economy, the primary question in this chapter is what implications an American attack on Iran's nuclear facilities would have on the global economy. Would an attack set in motion a chain-reaction with severe consequences for the world economy? The main argument proposed here is that Iran alone is not sufficiently important economically to have a major impact on the global economy. That is not to say that there will not be any global economic effects of an attack, only that the effects will not be substantial enough on their own to lead to a global economic recession. In other words, it is quite likely that there would be far-reaching regional and local consequences of an attack that in turn would influence the development of the world economy negatively, but not to the extent that a US attack on Iran would lead directly to a global recession.

Global economic implications of an attack

There are a number of key factors to consider when trying to forecast the global economic implications of a potential attack on Iran. First, Iran's connectivity to the rest of the world is fundamental to how the effects of an attack may transmit to the rest of the world economy. Will there be

¹¹⁴ The volatility index (VIX), a.k.a. "the investor fear gauge," shows that volatility has gone down remarkably after the start of the war in Iraq in March 2003. Terrorist attacks after 9/11 do not stand out in the index. For more on the VIX, see <http://www.cboe.com/micro/vix/introduction.aspx>.

direct or indirect effects and will they hit the operation of the real economy, market sentiments, or both? Second, the timing of the attack in relation to what is going in the world economy at that particular point in time is crucial in both how and to what extent events will spill over and influence the world economy. If the world economy, for example, is already weakened by other events, such as the present confusion surrounding the consequences of the sub-prime mortgage crisis emanating from the US, it is quite possible that an attack will be the event that tips the scales and further worsens the economic outlook. Finally, how Iran responds to an attack will be crucial to the effects on the global economy. For example, if Iran were able to seriously disrupt oil production in the Gulf States, there would be major repercussions in the world economy.

In order to answer these questions, the following sections analyse Iran's connectivity to the global economy, discuss the timing of an attack and assess the possible Iranian response in relation to the global economy.

Iran's connectivity

Iran's connectivity to the global economy is a crucial consideration in determining the global economic consequences of an attack. In order to assess this, it is necessary to search for all the potential transmission paths emanating from Iran. Iran's connections to the global economy give an indication of where, and through which conduits, the effects of an attack might spill over to the global economy. The strength of Iran's links to the global economy also provide an indication of how serious the impact might be on global economic development. Connectivity is a key factor in understanding the potential impact of an attack on the global economy.

In general, the Middle East is poorly integrated into the world economy. Many of the countries are characterised by relatively high rates of population growth, slow economic growth and weak links to the global economy.¹¹⁵ Global financial integration and trade performance lags behind that of other regions. In the first decades after the Second World War, the Middle East region did as well as, or better than, Latin America and Asia. For the past thirty years, however, the region has declined

¹¹⁵ George T. Abed, "Unfulfilled Promise," *Finance & Development* 2003.

steadily despite rapidly rising oil prices.¹¹⁶ The region's failure to integrate with the world economy is obvious. Bergsten even goes so far as to claim that "most of the region has essentially 'de-globalised'."¹¹⁷

Iran, in particular, has been quite successful in withstanding or resisting the process of globalisation.¹¹⁸ There are of course many ways to measure the level of globalisation among countries. Although most globalisation indices are debatable, one that has become quite well established is the A.T. Kearney/Foreign Policy Globalisation Index.¹¹⁹ As is the case with most indices, the globalisation index has methodological flaws. However, the continuous ranking of Iran as the least globalised country in the annual survey indicates that although Iran is an influential geopolitical actor in the region, it is poorly connected and integrated into the world economy. US sanctions, low investor confidence and a regime that cracks down on personal and political freedoms prevent Iran from integrating into the world economy.

This low level of integration into the world economy has consequences for the domestic economy. Iran is facing significant economic problems, such as inflation, stagnant *per capita* income, low levels of investment and high income disparity. There is a constant lack of investment, both domestic and foreign, and Iran needs the infusion of new technologies from abroad. Resisting the forces of globalisation makes it hard for Iran to improve its present situation. Oil revenues have turned Iran into a *rentier* state. Rather than depending on tax revenues for its financial needs, the state is the provider of finance capital.¹²⁰ Iran is not alone in mismanaging its oil wealth with damaging effects on economy and politics. Other

¹¹⁶ Robert Looney, "Why has the Middle East been so Slow to Globalize?," *Review of Middle East Economics & Finance* 3, no. 3 (2005).

¹¹⁷ C. Fred Bergsten, "The G-20 and the World Economy," *World Economics* 5, no. 3 (2004).

¹¹⁸ Ali Mohammadi, ed., *Iran Encountering Globalization: Problems and Prospects* (London: RoutledgeCurzon, 2003).

¹¹⁹ The index ranks 62 countries on 12 variables that are divided into 4 baskets, including economic integration, personal contact, technological connectivity and political engagement "The Globalization Index," *Foreign Policy*, November - December 2006.

¹²⁰ G. Reza Ghorashi, "Economic Globalization and the Prospects for Democracy in Iran," in *Iran Encountering Globalization: Problems and Prospects*, ed. Ali Mohammadi (London: RoutledgeCurzon, 2003), 82-83.

petro-states – Algeria, Indonesia, Nigeria and Venezuela, for example – also suffer from the resource curse.¹²¹

Iran has been able to resist the pull of the global economy because of its oil. Iran has not yet put on the ‘golden straight-jacket’¹²² in recognition of the rules of a free market economy. Iran has also been kept economically isolated by US, and to a lesser extent UN, sanctions. The Iranian economy and the energy sector in particular have suffered due to these sanctions. In particular, the energy industry needs investment for both maintaining and developing the level and quality of production.

Although the global demand for oil has increased and consequently raised the price of oil substantially, the Iranian economy is suffering nonetheless. In April 2006, the international credit rating agency Fitch Ratings downgraded Iran’s foreign currency rating to ‘B+’ due to deterioration in the economic policy framework and increasing political risk. The Iranian stock market has been declining in real terms for over two years. The real exchange rate has also appreciated because of both rising inflation and high oil revenues. Fitch concludes that Iran’s banking system is “very weak”.¹²³

Iran’s oil production has stagnated since the revolution. The country produces about 4 million barrels per day (mbpd), whereas pre-revolutionary Iran had a production of about 7 mbpd in 1979.¹²⁴ This stagnation is to a large extent the result of decreasing investment in oil resources due to – among other things – long-standing US unilateral and multilateral sanctions.¹²⁵ American pressures on Western banks and companies to refrain from doing business with Iran have forced Iranian

¹²¹ See, for example, Michael L. Ross, “Does Oil Hinder Democracy?,” *World Politics* 53, no. 3 (2001). and Terry Lynn Karl, *The Paradox of Plenty: Oil Booms and Petro-States* (Berkeley, CA: University of California Press, 1997).

¹²² Thomas L. Friedman, *The Lexus and the Olive Tree* (London: HarperCollinsPublishers, 2000), ch. 6.

¹²³ Richard Fox and Gerry Rawcliffe, *Bank Systemic Risk Report* (New York, NY: Fitch Ratings, 2007), Special Report.

¹²⁴ Edward L. Morse and Amy Myers Jaffe, “OPEC in Confrontation with Globalization,” in *Energy and Security: Toward a New Foreign Policy Strategy*, ed. Jan H. Kalicki and David L. Goldwyn (Baltimore, MD: The Johns Hopkins University Press, 2005), 79.

¹²⁵ *Ibid.*, 81.

authorities and businesses to switch more external transactions from the US dollar to the Euro.¹²⁶

Iran is in dire need of foreign investment. For example, the managing director of the National Iranian Oil Company (NIOC), Gholamhossein Nozari, has admitted that Iran needs about USD 94 billion of foreign investment by 2011 to bolster oil and gas production. Current output is dropping by 7% per year due to depletion and lack of maintenance of Iran's oil and gas production facilities.¹²⁷

Iran's oil is both a blessing and a curse for the Iranian government. Iran's fragile and imbalanced economy depends heavily on oil exports and high oil prices. Oil accounted for about 80% of Iranian exports in 2005 and the main export markets were Japan (17.3%) and China (11.4%).¹²⁸ It is oil resources that propel Iran to the centre stage of world affairs and effectively fund its nuclear facilities. In the event of an attack, the current tight oil market would make it possible for Iran to use oil as a weapon. However, Iran's dependence on oil exports could also be used against it, for example if an oil embargo were to be imposed. Although Iran is a major oil exporter, it needs to import petrol because its refinery capacity is too small to meet its domestic needs.¹²⁹ Oil exports keep Iran's economy afloat and if the country's already suffering economy were deprived of that income, this would put the Iranian government in a very difficult position.¹³⁰ The Iranian government is aware of the problem and is actively seeking to reduce its dependence on foreign investment in the energy sector and to make its economy more self-reliant.¹³¹ However, without the foreign exchange generated from oil exports, Iranian industries would have serious difficulties obtaining capital goods and raw materials from abroad and the Iranian government would have to scale back its spending.

¹²⁶ The Economist Intelligence Unit, *Country Report: Iran* (London, February 2007), 30.

¹²⁷ Laura Goldman, *Financial Weapons Can Be Effective* (Washington, DC: Center for Security Policy, 2007), CSP Security Forum.

¹²⁸ Shmuel Even, *The Iranian Nuclear Crisis: The Implications of Economic Sanctions* (Jaffee Center for Strategic Studies, 2006, accessed 31 August 2007); available from <http://www.tau.ac.il/jcss/taunotes.html>.

¹²⁹ The Economist Intelligence Unit, *Country Report: Iran*, 34-5.

¹³⁰ Even, *The Iranian Nuclear Crisis: The Implications of Economic Sanctions* (accessed when?).

¹³¹ The Economist Intelligence Unit, *Country Report: Iran*, 10.

There would be many difficulties involved in imposing a successful embargo. In order to succeed, it would have to be preceded by extensive international political and economic coordination and preparations. Otherwise, it would run the risk of producing a backlash through peaking oil prices in the world market. It would be very hard, for example, to get China to participate in an embargo. OPEC would have to be convinced to increase its production to make up for some of the 2.4 mbpd that Iran exports.¹³² Although OPEC's spare production capacity has increased since 2004¹³³, measures would probably have to be taken on both the supply and demand side in order to avoid a bidding war on oil. In the event of an oil embargo targeted at Iran, measures to overcome the gap between supply and demand for oil could include building stockpiles, finding alternative energy sources, and schemes to diminish energy consumption.

Iran's connectivity to the global economy is limited and the primary transmission path is via the country's oil production. However, Iran is itself highly dependent on the operation of its oil industry. If Iran were to shut off its oil exports or if the international community were to impose an effective oil embargo on Iran, the likely effect would be higher oil prices that in turn would accelerate inflation and moderate the pace of world economic growth. If this were to happen, some countries would suffer more than others from the higher oil price. Countries that are highly dependent on oil would suffer directly, whereas other countries would suffer indirectly from the general downturn in the world economy. The US economy, for example, is highly dependent on oil. The US consumes more than 25% of the total output of oil (total consumption 20.7 mbpd, net imports 10.4 mbpd) and would suffer directly from higher oil prices. Other countries would also suffer directly as a result of higher oil prices, but the effect on them might be moderated or offset due to the present depreciation of the US dollar against the Euro and many other currencies. However, even if they did not suffer directly, there would be indirect effects caused by higher inflation and slower growth.

¹³² Even, *The Iranian Nuclear Crisis: The Implications of Economic Sanctions*(accessed).

¹³³ Nimat B. Abu Al-Soof, "The Role of OPEC Spare Capacity," in *Offshore Technology Conference 2007* (Houston, TX: OPEC, 2007).

Oil prices have been high and rising for a number of years and the world economy has coped quite well so far. When the price has gone up, more sites and deposits have become economically viable for oil production. There are also more opportunities for energy substitution than before. Although a US attack on Iran would temporarily lead to substantially higher oil prices, the world economy is not as vulnerable to supply cuts as it was during the oil crises of the 1970s.

Timing

Another key factor for the world economy is the timing of an attack. The conjunction of events is important because it influences the general market sentiment or confidence level on global financial markets. Krugman makes the argument that “market psychology is crucial...because believing makes it so”¹³⁴ and in this way the prejudices and perceptions of financial actors take on the character of economic fundamentals. The confidence level depends on the overall assessment of both economic fundamentals and the intersubjective dimension of how other market actors will act. It is impossible to forecast what exactly will break a positive market momentum or start a run for the exits, or when this will happen. However, the overall assessment of the market will decide how long it will take for the actors who have exited the market to enter it again – that is, when greed will overtake fear as the predominant market sentiment.

Given that the Iranian economy is quite isolated and only has rudimentary connections to the global economy, the timing of an attack would be crucial in order to produce a major impact on the global economy. In the event of attacks on Iranian nuclear facilities, the risk is that a poor or unfortunate timing of the attacks would deal the final blow to an already shaken market sentiment in the global economy. Rather than the actual or real effects of the attacks, it is the conjunction with other events that might elevate the issue and amplify the reaction in the markets. Although limited strikes on Iran’s nuclear facilities may seem to have either very limited or no correlation with the operation of the global economy, attacks may still be interpreted as significant in the markets. In

¹³⁴ Paul R. Krugman, *The Return of Depression Economics* (London: Penguin, 2000), 110.

this respect, the psychological effects of the attacks are more important than the physical.

Without augmenting factors, it would seem unlikely that limited bombing raids would produce serious negative effects on the global economy. Whether market actors will connect or separate the issues of limited attacks on Iranian nuclear facilities and the general world economy is to a large extent dependent on the situation in the markets at the time of the attacks and the way in which Iran and other countries respond.

At the time of writing, the financial markets are already volatile and therefore more sensitive to what may seem to be unrelated events, such as an attack on Iranian nuclear facilities. The sub-prime mortgage market crisis in the US has shaken financial markets around the world, forced many central banks to provide massive liquidity infusions to avoid a market collapse, and called into question the risks involved in new financial instruments. When financial market actors are already jittery, it is quite likely that they will react to geopolitical developments on the terms that it is better to be safe than sorry. Another market exodus would severely strain global financial markets.

The same goes for the real economy. If the price of oil becomes very high (it is currently above USD 70 a barrel and it has not been above USD 80 a barrel in the past five years [jmf Jan 08]), and the attacks cause it to rise even higher, it is more likely that the attacks will have a negative impact on global economic development. How serious this negative impact is will depend on how long the price remains elevated. In this scenario, the attacks could very well be the event that tips the scales for the market sentiment and thereby turn out to have a serious impact on the global economy. The risk in this case is not that the attacks alone influence the global economy to the extent that it loses its momentum, but rather that the attacks are perceived as adding risks that change the market sentiment and set in motion or speed up a downward spiral.

Response

Closely connected to the timing of any attacks is how the Iranian government would respond to air strikes on its nuclear facilities. The impact on the global economy will obviously depend on the Iranian

government's policy choices, both in forming the predominant market interpretation of the potential consequences of attacks and in having an effect on the real economy.

The official Iranian response is important from a global economic perspective, because it will give an indication of how long the conflict will last. The longer the conflict lasts, the likelier it is that there will be substantial consequences for the real economy. The response will also provide an indication of the scope of the consequences and determine whether the effects will be concentrated on a local or regional level, or spill over onto the global economy. If Iran is able to put together some kind of coherent strategic response, the longer and more intense the battle will become and the greater the risks and potential implications for the global economy. Limited air strikes may rapidly escalate into something completely different, especially if the Iranian government has a surprising and stinging response available.

The isolation of Iran makes it very difficult to assess how the Iranian government would evaluate the situation and choose to respond. Speculation ranges from doing nothing to coordinated terrorist attacks around the world and a much-touted Republican Guard fighting back. Obviously, if Iran gives up its nuclear programme, either through negotiations or soon after the attacks, the implications for the global economy would be positive to none. However, the option of not responding seems very unlikely in the event of attacks. The probability of Iranian counterattacks by conventional means may be lower than is often claimed, as they know that the US navy would be prepared and ready to "destroy any airstrip or jetty from which attacks are launched."¹³⁵ However, Iran can and will respond in some fashion to an attack on its nuclear facilities – it is certainly not without means of retaliation. It would be reasonable to assume that Iranian military planners have spent months, if not years, going over where and how to respond to a US attack. For example, Iran could launch strikes against American forces in Iraq, or it could launch a missile attack on Israel or on American military installations in the region.¹³⁶ The Iranian military could also try to

¹³⁵ Edward N. Luttwak, "The Middle of Nowhere," *Prospect Magazine*, May 2007.

¹³⁶ See, for example, James Dobbins, Sarah Harting, and Dalia Dassa Kay, *Coping with Iran: Confrontation, Containment, or Engagement? A Conference Report* (Santa Monica, CA: RAND

destabilise the region in other ways and/or disrupt tanker traffic through the Gulf in an attempt to cause mayhem in the energy markets.

Although the Iranian response is a great unknown and complicates any attempts at forecasting the global economic implications of an attack, there would certainly be political consequences. The political fallout of air strikes would in all likelihood be immense. As for example Dueck and Takeyh point out, it is not difficult to foresee "a national backlash among the Iranian public, international condemnation of the United States, the strengthening of Iran's hard-liners, the potential disruption of Persian Gulf oil supplies to the industrialized world, and Iran sponsored attacks against American troops and interests throughout the region."¹³⁷ The political fallout in itself could have major negative consequences for the operation of the global economy and the future prospects of the ongoing process of economic globalisation. The 9/11 attacks and the GWOT have already caused setbacks in terms of renewed calls for protectionism and the mobility of goods, people and money have been circumscribed on behalf of homeland security. Depending on Iran's response, an attack could become another serious blow to the process of economic globalisation. This could in turn be the worst long-term outcome for the global economy of an attack on Iran's nuclear facilities.

Conclusions

This chapter analyses the global economic consequences of an American attack on Iran's nuclear facilities and argues that Iran is not sufficiently connected to the global economy to pose a major direct threat to the global economy. Secondary or indirect effects, however, are harder to assess but could nonetheless be detrimental to the development of the global economy. It is primarily the timing of an attack and the Iranian

Corporation, 2007), 23-26, Conference Proceedings; Yossi Mekelberg, *Israel and Iran: From War of Words to Words of War?* (London: Chatham House, 2007), 5, Briefing Paper, MEP BP 07/01.

¹³⁷ Colin Dueck and Ray Takeyh, "Iran's Nuclear Challenge," *Political Science Quarterly* 122, no. 2 (2007): 201.

response to an attack that could tip the scales of an already jittery global economy.

The global economic implications will most likely not be a decisive factor in the American decision about whether or not to launch attacks on Iran's nuclear facilities. In retrospect, however, a US attack on Iran at this point in time may very well be perceived as the *coup de grâce* for the positive development of the global economy.

References

- Abed, George T.: "Unfulfilled Promise," *Finance & Development*, 2003.
- Abu Al-Soof, Nimat B.: "The Role of OPEC Spare Capacity". *Offshore Technology Conference*, 2007. Houston: OPEC, 2007.
- Bergsten, Fred C.: "The G-20 and the World Economy," *World Economics*, Vol. 5, No. 3, 2004.
- CBOE (Chicago Board Option Exchange): URL: <http://www.cboe.com/micro/vix/introduction.aspx>.
- Dobbins, James; Harting, Sarah; and Dassa Kay, Dalia: *Coping with Iran: Confrontation, Containment, or Engagement? A Conference Report*. Santa Monica: RAND Corporation, 2007. (Conference Proceedings; Yossi Mekelberg, *Israel and Iran: From War of Words to Words of War?* London: Chatham House. 2007. Briefing Paper, MEP BP 07/01.
- Dueck, Colin and Takeyh, Ray: "Iran's Nuclear Challenge". *Political Science Quarterly*, Vol. 122, No. 2, 2007.
- The Economist Intelligence Unit: *Country Report: Iran*. London, February 2007.
- Even, Shmuel: *The Iranian Nuclear Crisis: The Implications of Economic Sanctions*. Jaffee Center for Strategic Studies, 2006, accessed 31 August 2007. Source: <http://www.tau.ac.il/jcss/taunotes.html>.
- Friedman, Thomas L.: *The Lexus and the Olive Tree*. London: HarperCollinsPublishers. 2000
- Fox, Richard and Rawcliffe, Gerry: *Bank Systemic Risk Report* New York: Fitch Ratings. Special Report, 2007.

Ghorashi, G. Reza: "Economic Globalization and the Prospects for Democracy in Iran", in *Iran Encountering Globalization: Problems and Prospects*, Mohammadi, Ali (ed.). London: Routledge-Curzon. 2003.

Goldman, Laura: *Financial Weapons Can Be Effective*. Washington, D.C.: Center for Security Policy, 2007 CSP Security Forum.

"The Globalization Index," *Foreign Policy*, November - December 2006.

Krugman, Paul R.: *The Return of Depression Economics*. London: Penguin. 2000.

Looney, Robert: "Why has the Middle East been so Slow to Globalize?". *Review of Middle East Economics & Finance*, Vol. 3, No. 3, 2005.

Luttwak, Edward N.: "The Middle of Nowhere". *Prospect Magazine*, May 2007.

Lynn Karl, Terry: *The Paradox of Plenty: Oil Booms and Petro-States*. Berkeley: University of California Press. 1997.

Mohammadi, Ali (ed.): *Iran Encountering Globalization: Problems and Prospects*. London: RoutledgeCurzon. 2003.

Morse, Edward L. and Myers Jaffe, Amy: "OPEC in Confrontation with Globalization", in *Energy and Security: Toward a New Foreign Policy Strategy*, Kalicki, Jan H. and Goldwyn, David L. (EDS.). Baltimore: The Johns Hopkins University Press. 2005.

Ross, Michael L.: "Does Oil Hinder Democracy?", *World Politics*, Vol. 53, No. 3, 2001.

Wolf, Martin: "Globalisation's Future Is the Big Long-Term Question," *Financial Times*, 9 January 2007.

Chapter 9. Attacking Iran: Environmental issues

Mattias Waldenvik

Introduction

This chapter addresses the environmental issue of radioactivity that could result from an attack on Iran's nuclear infrastructure with conventional weapons. The discussion explores potential targets that form part of a possible Iranian nuclear weapons programme and emphasises the environmental consequences that differ from the general case of bombing industrial infrastructure. The first section introduces nuclear and non-nuclear infrastructure relevant to a nuclear weapons programme. The infrastructure includes types of facilities that, with the facts currently at hand, are not known to exist in Iran. The following section addresses the environmental issues from a geographical standpoint, where co-located facilities are analysed jointly.

Nuclear infrastructure

Most of the information on sites discussed here is taken from an IAEA report that lists all locations in Iran relevant to IAEA safeguards.¹³⁸ The report is over four years old but it can still serve as the backbone of discussion. It is worth mentioning that there may exist secret locations known to the targeters, but unknown to us, that would render this discussion incomplete.

Uranium mines and ore processing

Uranium mines and ore processing facilities are not under IAEA safeguards and are therefore not as transparent as safeguarded sites. Iran is known to operate two uranium mines; the Saghand mine in the Ardakan area in central Iran and the Gchine mine further south, close to Bandar Abbas. The uranium ore is processed to yellow cake^{139, 140} at facilities in the vicinity of the uranium mines.

¹³⁸ IAEA. Implementation of the NPT safeguards agreement in the Islamic Republic of Iran. IAEA Report by the Director General GOV/2003/75, November 2003. Derestricted 2003-11-26.

¹³⁹ Yellow cake is an uranium oxide, U₃O₈, with a characteristic yellow colour.

Uranium conversion

The yellow cake is converted to uranium hexafluoride (UF₆) at a uranium conversion facility (UCF). Iran operates a UCF in Esfahan.

Uranium enrichment

The enrichment of uranium involves changing the ratio of the various isotopes of uranium. The process chosen by Iran to enrich uranium on an industrial scale is enrichment by centrifuges, a complex technology where uranium hexafluoride is injected into several hundreds to several thousands of fast-rotating centrifuges arranged in cascades.

In the desert between Kashan and Natanz there are two co-located facilities usually referred to as the Natanz plant. The Pilot Fuel Enrichment Plant (PFEP) is located in what appears to be a conventional industrial facility, while the Fuel Enrichment Plant (FEP) is located in a hardened underground facility. Construction work on the cascades is currently underway at the FEP.

Fuel manufacturing

Uranium, whether enriched or not, intended for use as reactor fuel is converted into the appropriate form at an UCF and is then processed into fuel at Fuel Manufacturing Plants (FMP). Iran operates an FMP in Esfahan.

Nuclear reactors

Iran operates a number of facilities that can be classified as nuclear reactors. As discussed below, this is where the main concern lies regarding the environmental consequences of an attack. The nuclear reactors operating in Iran are listed in Table 1.

The Miniature Neutron Source Reactor (MNSR) in Esfahan is a small research reactor of Chinese design used for neutron activation analysis. There are 343 fuel rods in the reactor core, each with dimensions 4.3 by

230 mm.¹⁴¹ Since the cladding thickness is 0.6 mm, the total fuel volume in the reactor is less than one litre.

The Light Water Sub-Critical Reactor (LWSCR) in Esfahan, also of Chinese design, is a type of research reactor that needs an external neutron source for the chain reaction to proceed. The size of the core is not known, but it is probably very small.

Yet another small reactor in Esfahan is the Heavy Water Zero Power Reactor (HWZPR). The reactor core size, based on data from the IAEA database of research reactors, is estimated to be less than 5 kilogrammes of uranium.¹⁴²

The major concern, from an environmental standpoint, are the larger reactors in Tehran, Arak and Bushehr. These facilities are discussed below.

Reprocessing facilities

Even though Iran has performed some laboratory-scale reprocessing experiments, and would need a reprocessing facility to extract plutonium from spent nuclear fuel in order to have a weapons programme based on the plutonium route, there are at present no such known facilities in Iran.

Storage sites

There are storage sites and waste handling facilities co-located with the reactor in Tehran, in Karaj and in the vicinity of Anarak, in central Iran.

Other facilities

Next to the Heavy Water Reactor (HWR) under construction in the vicinity of Arak there is a heavy water production plant, which is operational.

Adjacent to the Fuel Manufacturing Plant in Esfahan there is a Zirconium Production Plant. Zirconium is used as cladding for the fuel elements produced at the aforementioned plant.

¹⁴¹ IAEA. Research reactor database (RRDB). www.iaea.org/worldatom/rrdb. The information in the database is only as good as that supplied to the IAEA.

¹⁴² IAEA. Research reactor database (RRDB). www.iaea.org/worldatom/rrdb. The information in the database is only as good as that supplied to the IAEA.

There are radioisotope production facilities under construction at the reactor site in Arak and in operation at the reactor in Tehran.

Environmental impact

While the previous section roughly followed the structure of the nuclear fuel cycle, the following section addresses the environmental impact from a geographical standpoint, where co-located facilities are grouped together.

Bushehr

At present, the reactor under construction at Bushehr does not constitute a serious environmental problem since it is still under construction. This situation will change radically when/if the reactor is loaded with fuel and started. The energy-producing fission reactions in the low enriched uranium fuel will produce highly radioactive fission products. The reactor core weighs in at about 1,000 kilogrammes and its destruction could be a threat both locally around the city of Bushehr and elsewhere. A detailed threat estimate is dependent on, among other factors, the extent of destruction of the actual reactor core. Bushehr, with about 150,000 inhabitants, would be at risk in a large number of scenarios. An explosion due to a runaway reactor with the possibility of Chernobyl size consequences is, on the other hand, deemed highly unlikely with the present reactor design.

It is worth noting the fact that Israel chose to bomb the Osirak reactor in Iraq before it went operational. The possible environmental consequences could make the political price for bombing an operational reactor too high.

The power-producing reactor in Bushehr is not considered a primary component of a possible nuclear weapons programme and would therefore not be a primary target for an operation whose purpose is to delay or destroy a weapons programme. However, disregarding the current arrangement with Russia supplying the fuel and retrieving spent fuel, it is technically possible to use this reactor for the production of weapons grade plutonium.

Tehran

The Nuclear Research Centre in Tehran with its research reactor, radioisotope production facility and the Jabr Ibn Hayan laboratories located in the densely populated capital could, if attacked, lead to serious environmental problems. The reactor is several orders of magnitude smaller than the reactor in Bushehr but due to its location the risk of collateral damage due to radioactive contamination is deemed severe. Again, the political price for targeting this operational reactor could very well be considered too high to pay since the target is not essential for a nuclear weapons programme.

Arak

In a rather remote location, with Arak being the closest major city, there are facilities for the production of heavy water in operation and a heavy water reactor is under construction. At present, with the reactor being under construction, the environmental impact from an attack would, from a radioactive perspective, be negligible. Since heavy water reactors are ideal for plutonium production, this location would likely be a target for an attack aimed at delaying or stopping the road to a plutonium-type nuclear weapon.

Esfahan

Locations in Esfahan, the exact details are unclear at present, contain small research reactors for educational or research purposes. These reactors are not considered part of the nuclear fuel cycle and would not have any practical function in a nuclear weapons programme. The small size of the facilities would, in the unlikely scenario that they were to be attacked, limit the radioactive contamination.

At a location close to the southern parts of Esfahan are the Uranium Conversion Facility (UCF), the Fuel Manufacturing Plant and a Zirconium Production Plant. There are also underground facilities in the mountains nearby, which possibly contain storage sites for yellow cake and uranium hexafluoride, the input and output products of the UCF respectively.

The radioactive impact from an attack on these facilities would be minor. The impact from the various chemicals involved in the conversion process, as well as the chemical properties of the uranium hexafluoride (UF₆), would probably be a much greater problem. UF₆ reacts with water to produce the toxic substances hydrogen fluoride and uranyl fluoride. Direct contact will burn skin, eyes and the respiratory tract, and inhalation may be fatal.

Natanz

The sparsely populated desert between Natanz and Kashan is the location of the Pilot Fuel Enrichment Plant and the hardened underground Fuel Enrichment Plant. In an attack attempting to delay or destroy a nuclear weapons programme, this would be a high-value target since the enrichment of uranium constitutes a bottleneck for the production of nuclear weapons based on uranium.

The environmental impact from a radioactive perspective would be small or negligible, since the uranium in the uranium hexafluoride used in the process is of low activity and used in small amounts; only about one kilo is being processed at a given time given the full capacity of about 3000 centrifuges.

Conclusion

We can conclude from the discussion above that the major nuclear environmental threat, under the circumstances considered here, is from nuclear reactors in operation since spent fuel is highly radioactive. This also renders storage facilities located close to the reactor and elsewhere an environmental threat in the event of an attack.

Another type of facility where highly radioactive spent fuel is treated is reprocessing facilities. However, at present no reprocessing facilities are known to exist in Iran. If Iran is to use its heavy water reactor to produce plutonium for a nuclear weapons programme there is a need for a reprocessing plant to extract the plutonium from the spent fuel. A reprocessing plant would be both a valuable target in an attempt to destroy or delay the development of nuclear weapons and a potentially serious environmental problem.

None of the other sites mentioned, but so far not discussed in any detail, constitutes a possible environmental problem from a radioactive perspective. Some of these facilities, such as the Uranium Conversion Facility discussed above and the facilities for production of yellow cake, can be considered chemical facilities rather than nuclear facilities from an environmental point of view.

References

IAEA (International Atomic Energy Agency): Research reactor database (RRDB). Source: www.iaea.org/worldatom/rrdb

IAEA (International Atomic Energy Agency): *Implementation of the NPT safeguards agreement in the Islamic Republic of Iran*. IAEA, Report by the Director General, GOV/2003/75, November 2003.

Chapter 10. US military attacks on Iranian nuclear facilities and international law

Bengt-Göran Bergstrand

This chapter discusses some aspects of possible unilateral military attacks by the United States on Iranian nuclear facilities from an international law perspective.¹⁴³ In this short exposé there are a number of questions that are not addressed, such as whether such US actions would perhaps be desirable for political or strategic reasons, or whether such actions may be carried out in such a manner that they would also be successful in preventing Iran from acquiring nuclear weapons.

Another question which is not discussed relates to the very concept of, and the role played by, international law.¹⁴⁴ This chapter takes a rather formalistic and legalistic approach, and could therefore be criticised by some having differing views on how international law should be understood. According to some other views, which may have a greater influence on US decision-making than the present formalistic approach, it may be argued that international law is dynamic and changing as new precedents are created, and perhaps also that the motive for taking certain actions should be considered, meaning that certain breaches of formal rules may in some cases therefore both be allowed and justified.¹⁴⁵ Another argument raised in the United States is that "...As an independent sovereign, the United States is fully entitled to interpret international law for itself. The views of international organizations,

¹⁴³ The first version of this paper was written for the FOI Conference on 10-11 October 2007. As the paper primarily discuss various legal principles, only some minor changes have been made with regard to the US National Intelligence Estimate released in early December 2007, which stated that "Iran stopped nuclear weapons work in 2003"; see CNN News file at <http://www.cnn.com/2007/POLITICS/12/03/iran.nuclear/index.html>.

It will presumably be much more difficult for the US Government to press for tougher sanctions, and also to justify an attack, after the publication of this report.

¹⁴⁴ See *Wikipedia.org* - "Public international law" >

http://en.wikipedia.org/wiki/Public_international_law; Håkan Strömberg, Göran Melander: *Folkrätt*, Studentlitteratur, Lund 1989 (5th edition), Chapter 1-3.; Hilding Eek, Ove Bring, Lars Hjerner: *Folkrätten*, Norstedts Stockholm 1987 (4th edition), "Chapter Introduktion" and Chapter VIII.

¹⁴⁵ David Kleimann: "Positivism, the New Haven School, and the Use of Force in International Law", *BSIS Journal of International Studies* Vol. 3, 2006.

including the United Nations, other states, and non-governmental organizations (NGOs) may be informative, but they are not legally binding unless, and only to the extent that the United States agrees to be bound...".¹⁴⁶

Nevertheless, in this chapter the general conclusion is that – as international law prohibits countries from using military force against each other – there are, in theory, only two instances when US attacks on Iranian nuclear facilities may be in accordance with international law; if mandated by the UN Security Council, or if the criteria for ‘pre-emptive self-defence’ were met.¹⁴⁷ As US attacks cannot possibly meet these latter criteria, it is only with a strong mandate from the Security Council that such attacks will be permitted by international law. However, the current Bush Administration has not paid too much attention to international law, so other factors will presumably be more important for a US decision on whether the Iranian nuclear facilities should be attacked or not.

International law forbids the use of military force

Although the United Nations is not an international legislature, many of the conventions, treaties and standards brought about by the United Nations form the basis of the laws governing relations among nations.¹⁴⁸

Under international law, a general principle is that states are not allowed to use military force against each other. Indeed, the UN Charter clearly states that “Members shall refrain in their international relations from the threat or use of force against the territorial integrity or political independence of any state...” (Article 2, paragraph 4) and much of the Charter, and the United Nations organisation created by the Charter, is aimed at providing a machinery for maintaining peace and security and a

¹⁴⁶ *The Heritage Foundation Backgrounder* No. 1961, 18 August 2006 > <http://www.heritage.org/Research/WorldwideFreedom/bg1961.cfm>,

¹⁴⁷ “The legality of attacking Iran (international law version)”, *ForeignPolicy.com- David Bosco's blog* 8 February 2007 > <http://blog.foreignpolicy.com/node/3516>.

¹⁴⁸ For an overview of UN activities concerning international law, see the UN web site at <http://www.un.org/english/> > “International Law” (link <http://www.un.org/law/>); see also Ove Bring: *FN-stadgan och världspolitik*, *Om folkrättens roll i en föränderlig värld*, Norstedts Juridik Stockholm 1994; Strömberg and Melander, op. cit. Chapter 12-13; Eek – Bring – Hjerner, op. cit. Chapter V.

peaceful settlement of disputes.¹⁴⁹ Thus, if there is a dispute between some countries, they should “...seek a solution by negotiation, enquiry, mediation, conciliation, arbitration, judicial settlement, resort to regional agencies or arrangements, or other peaceful means of their own choice” (Article 33, paragraph 1). If the parties fail to find a solution, they should refer their dispute to the UN Security Council.

However, there are two exceptions to this general principle that allow a country to use force against another state. The first case concerns self-defence; if attacked by an aggressor, it is – according to Article 51 in the UN Charter – legitimate for the attacked state to defend itself.¹⁵⁰ This legitimate ‘self-defence’ also includes actions by Allied countries: if the Soviet Union had attacked West Germany during the Cold War, all other NATO countries would have had the right – indeed the obligation – to assist Germany and counter-attack the aggressor.¹⁵¹ In addition, some general conditions regarding the use of force must also be observed. The actions undertaken must have a reasonable chance of success, without causing any disproportionate damage, particularly on civilian people and property.¹⁵²

The second case, when a country may use force against another state, concerns actions mandated by the Security Council, such as peace enforcement operations. Such peace enforcement operations should not be confused with UN peace-keeping operations – traditional ‘Blue

¹⁴⁹ The UN Charter is available at the UN web site at <http://www.un.org/aboutun/charter/>. Regarding Article 2, paragraph 4, see Eek, Bring, Hjermer, op. cit. Chapter XI.A and XIII; Bring, op. cit. Chapter I.3-4.

¹⁵⁰ Article 51 uses the expression “...the inherent right of individual or collective self-defence if an armed attack occurs...”. See also Eek, Bring, Hjermer, op. cit. Chapter XI; and Bring, op. cit. Chapter I.6.

¹⁵¹ It is worth noting here that it has also been argued that the rights of collective self-defence under the UN Charter could also justify US military actions if a country such as North Korea or Iran were to attack a US ally. Provided that certain conditions are met, an Iranian attack against US friends such as Saudi Arabia and Israel (or North Korea attacking South Korea and Japan), US military support to the attacked countries could also include US strikes against Iranian (and North Korean) nuclear establishments. See also Gregory E. Maggs: “How the United States Might Justify a Preemptive Strike on a Rogue Nation's Nuclear Weapon Development Facilities Under the U.N. Charter”, *Syracuse Law Review*, Vol. 57, No. 465, 2007 > http://papers.ssrn.com/sol3/papers.cfm?abstract_id=1029660.

¹⁵² See Eek, Bring, Hjermer, op. cit. Chapter XI; and Bring, op. cit. Chapter I.4.

Helmet' operations – which are carried out with the consent of the parties to a conflict, and only use force in self-defence.¹⁵³

Thus, there are only two theoretical ways in which an attack on Iranian nuclear facilities could be legally justified: if mandated by the UN Security Council – which, by definition, suggests that we are no longer talking of a unilateral US attack, but an action taken by the International Community – or if the Iranian nuclear programme could be proven to be so threatening that attacking it could be seen as an act of self-defence.

The rules for the Security Council to initiate military actions are spelled out in Chapter VII 'Action with Respect to Threats to the Peace, Breaches of the Peace, and Acts of Aggression' in the UN Charter. If a country seems to constitute a threat to peace and security¹⁵⁴, the Security Council may decide that various kinds of sanctions should be imposed against the country (Article 41). If such measures "...would be inadequate or have proved to be inadequate, it may take such action by air, sea, or land forces as may be necessary to maintain or restore international peace and security. Such action may include demonstrations, blockade, and other operations by air, sea, or land forces of Members of the United Nations" (Article 42). In the following articles, it is also stated that UN Members should be ready to provide military forces to such actions.¹⁵⁵

Without such a direct UN Security Council decision and mandate, an attack would be a violation of international law. The road to such a Security Council decision will presumably be related to the agreements against nuclear proliferation, which are therefore discussed below.

¹⁵³ United Nations: *Basic Facts About the United Nations*, United Nations Publications 1998, Chapter 2, page 76.

¹⁵⁴ Here, it should be noted that the UN Charter primarily deals with questions regarding Security Council interventions in cases of "threats to international peace and security". Related issues concern possible interventions in cases of e.g. a civil war, a humanitarian crisis or genocide, even though these cases might not threaten "international peace and security". In such circumstances, a "humanitarian intervention" might be called for, though such intervention is not discussed here as it would not be applicable in the Iranian case discussed in this report. For such interventions, see *Wikipedia.org* - "Humanitarian intervention" >

http://en.wikipedia.org/wiki/Humanitarian_intervention.

¹⁵⁵ *Basic Facts...*, Chapter 2; Bring, op. cit. Chapter II.3.

International agreements against nuclear proliferation

The role played by nuclear questions since the end of the Second World War can hardly be over-exaggerated. In the very first resolution passed by the UN General Assembly in January 1946, the “problems raised by the discovery of atomic energy” – “to ensure its use only for peaceful purposes” – are addressed.¹⁵⁶ Since then, the UN, as well as a number of other international and national organisations, has worked with nuclear questions.

The International Atomic Energy Agency (IAEA) is an independent international organisation related to the United Nations system, and the main international body concerning nuclear issues. The IAEA was created in 1957, and has two aims: to promote the peaceful use of nuclear energy, and to inhibit its use for military purposes.¹⁵⁷

The most important general agreement aimed at limiting the spread of nuclear weapons is The Treaty on the Non-Proliferation of Nuclear Weapons (NPT).¹⁵⁸ The NPT was negotiated during the 1960s, and opened for signature in 1968. There are currently only four countries (India, Pakistan, Israel and North Korea) that are not parties to this treaty, meaning that the NPT is the arms control treaty signed by the greatest number of states in the world. In addition, there are also several regional agreements, limiting the spread of nuclear weapons in various parts of the world such as the Antarctic territory, Latin America and Africa. As India, Pakistan and Israel have not signed the NPT, the nuclear weapons developed by these three countries have not been a violation of the treaty, while North Korea was a party to the NPT when it developed nuclear weapons – thereby violating the NPT – and North Korea therefore left the NPT.

¹⁵⁶ The Resolution is available at the www.un.org web site at <http://www.un.org/documents/ga/res/1/ares1.htm>.

¹⁵⁷ See *Wikipedia.org* - “International Atomic Energy Agency” > http://en.wikipedia.org/wiki/International_Atomic_Energy_Agency; and the IAEA website at <http://www.iaea.org/>. See also *Basic Facts...* page 63, and 113-14.

¹⁵⁸ See *Wikipedia.org* - “Nuclear Non-Proliferation Treaty”. http://en.wikipedia.org/wiki/Nuclear_Non-Proliferation_Treaty; the original NPT from 1968 (which does not include France or China, who signed the NPT in 1992) is available at the UN website at <http://www.un.org/events/npt2005/npttreaty.html>. See also *Basic Facts...* page 110-11.

The NPT makes a distinction between nuclear weapon states and non-nuclear weapon states. Five states are noted in these circumstances as nuclear weapon states; the United States, Soviet Union/Russia, the United Kingdom, France and China (the countries which also happen to be the permanent members of the UN Security Council). The nuclear weapon states agree not to transfer "...nuclear weapons or other nuclear explosive devices..." and "...not in any way to assist, encourage, or induce..." a non-nuclear weapon state to acquire nuclear weapons (NPT, Article I).

The five nuclear weapon states have also made some undertakings not to use their nuclear weapons against a non-nuclear weapons state.¹⁵⁹ However in 2002, the US, in its *Nuclear Posture Review*, declared that nuclear strikes could also be made against non-nuclear states.¹⁶⁰ The NPT also demands that the nuclear weapons states should work for disarmament, though these rules have not been adhered to, so one could discuss whether such negligence by the five nuclear weapon states would also amount to a violation of the NPT.

Each of the non-nuclear weapon states – all other countries having signed the NPT – "...undertakes not to receive the transfer from any transferor whatsoever of nuclear weapons or other nuclear explosive devices or of control over such weapons or explosive devices directly, or indirectly; not to manufacture or otherwise acquire nuclear weapons or other nuclear explosive devices; and not to seek or receive any assistance in the manufacture of nuclear weapons or other nuclear explosive devices". (NPT, Article II) Should Iran, or any other country, therefore have a clandestine nuclear weapons programme, such a programme would be a violation of international law.

All parties to the NPT have, however, the "...inalienable right...to develop research, production and use of nuclear energy for peaceful purposes without discrimination...". In order to ensure that a country only has a peaceful nuclear programme, and that none of its nuclear

¹⁵⁹ Jozef Goldblat: "No First Use of Nuclear Weapons", *Pugwash Meeting no. 279* (London, UK, 15-17 November 2002) > <http://www.pugwash.org/reports/nw/goldblat.htm>.

¹⁶⁰ "US "Negative Security Assurances" At a Glance", *Arms Control Association (ACA) Fact Sheet*, January 2008 > <http://www.armscontrol.org/factsheets/negsec.asp>; and Philipp C. Bleek: "Nuclear Posture Review Leaks; Outlines Targets, Contingencies", *Arms Control Association (ACA) - Arms Control Today*, April 2002 > http://www.armscontrol.org/act/2002_04/nprapril02.asp.

material is used for a military purpose, the non-nuclear country must therefore conclude agreements with the IAEA on safeguards. The IAEA then has the right to monitor and inspect the nuclear activities in the country.¹⁶¹ Whether this right still exists for a country which has had a clandestine nuclear weapons programme, and is thereby not complying with the NPT, is not clear. In the case of Iraq, Iraq was restricted by the Security Council from pursuing certain kinds of nuclear activities after the 1991 Gulf War, setting a precedent to support the idea that the Security Council can restrict a state's 'inalienable rights' under the NPT in response to violations of that agreement.¹⁶²

The IAEA reports to the UN General Assembly and Security Council (other UN 'specialist agencies', such as the World Bank, IMF and UNESCO, report to the UN Economic and Social Commission, ECOSOC). That the IAEA reports directly to the top political organs of the UN underlines its political significance.

It should also be noted that international law explicitly prohibits armed attacks against nuclear power plants. In Additional Protocol to the Geneva Conventions 1977, it is stated that "...nuclear electrical generating stations, shall not be made the object of attack, even where these objects are military objectives, if such attack may cause the release of dangerous forces and consequent severe losses among the civilian population" (Protocol I, Article 56, and Protocol II, Article 15).¹⁶³ As this clause could be interpreted in such a way that only nuclear power plants are exempted from attack, the IAEA has tried to broaden this prohibition to cover all kinds of nuclear facilities (including also e.g. research reactors, fuel fabrication and storage facilities etc). In 1987, a resolution on Protection of Nuclear Installations against Armed Attacks was

¹⁶¹ See the IAEA website at <http://www.iaea.org/> > "Our Work" > "Verification" (link <http://www.iaea.org/OurWork/SV/index.html>). Regarding IAEA inspections on Iran, see also Anthony H. Cordesman: Iran's Nuclear Program: UN and IAEA Reporting and Developments, *CSIS Working Draft* 27 November 2007 > http://www.csis.org/component/option,com_csis_pubs/task,view/id,4186/type,1/.

¹⁶² Jon Wolfsthal: "Understanding Iran's Nuclear Maneuvers", *CSIS Commentary* 12 January 2006 > http://www.csis.org/component/option,com_csis_progj/task,view/id,476/.

¹⁶³ The two protocols are available at the International Committee of the Red Cross, ICRC, website at <http://www.icrc.org/eng> > "Geneva Conventions" (direct link <http://www.icrc.org/Web/Eng/siteeng0.nsf/htmlall/genevaconventions>).

therefore adopted by the IAEA, but this resolution has so far not been developed to a binding convention.¹⁶⁴

The UN Security Council and the Iranian nuclear programme

Iran has had a nuclear programme since the 1950s. In the early 1970s – when the Shah was still in power – both the US and Iran agreed that oil supplies would eventually run out, and that Iran had a great need of nuclear power. Incidentally, both Vice-President Dick Cheney and the (former) Secretary of Defence, Donald Rumsfeld, were actively encouraging Iran to develop a nuclear power programme.¹⁶⁵

After the Iranian revolution, the US and many other countries ceased their nuclear co-operation with Iran. During the 1980s, a decade marked by the Iran-Iraq War, Iranian nuclear activities were at a rather low level, while Iran renewed its nuclear programme in the 1990s, with new agreements with Russia and China.

In 2002, it was revealed by some dissidents that Iran had two secret nuclear projects in the making; an enrichment facility in Natanz and a heavy water reactor in Arak. Such facilities should be declared to the IAEA, and Iran was greatly criticised for not having done so, but claimed that it had intended to do so when the facilities became operational, as stipulated by the IAEA. The IAEA therefore increased its supervision of Iran, and stated in late 2003 that while on one hand there was ‘no evidence’ that the undeclared facilities were part of a secret nuclear arms programme, on the other hand it was not certain that the Iranian nuclear programme was exclusively for peaceful usage, as claimed by the Iranians.

¹⁶⁴ Mohamed Elbaradei, Edwin Nwogugu, John Rames: “International law and nuclear energy: Overview of the legal framework”, *IAEA Bulletin* No 373 [Cached at <http://64.233.183.104/u/iaeaORG?q=cache:q79MBxfYGkwJ:f40.iaea.org/worldatom/Periodicals/Bulletin/Bull373/rames.>]

¹⁶⁵ For a good overview of Iranian nuclear efforts, see *Wikipedia.org* - “Nuclear program of Iran” http://en.wikipedia.org/wiki/Nuclear_program_of_Iran; and “Iran and weapons of mass destruction” > http://en.wikipedia.org/wiki/Iran_and_weapons_of_mass_destruction. See also the IAEA website at <http://www.iaea.org/> > “In Focus: IAEA and Iran” (direct link <http://www.iaea.org/NewsCenter/Focus/IaeaIran/index.shtml>). For a chronology of events, see Paul Kerr: “The Iran Nuclear Crisis: A Chronology”, *Arms Control Association (ACA) Country Resources* > <http://www.armscontrol.org/country/iran/iranchronology.asp>.

Three European countries then took a diplomatic initiative, and Iran signed an additional protocol with the IAEA. In September 2005, the IAEA stated that Iran's failures to meet its safeguards obligations constituted non-compliance with Iran's NPT Safeguards agreement. In February 2006, the IAEA formally made a report on Iran to the Security Council.

Since then, the Security Council has discussed the Iranian nuclear programme on several occasions, and has until now [February 2008] passed three resolutions. One of the more interesting aspects here is that both Russia and China have not stopped these resolutions, as Iran might have hoped. In Resolution 1696 (dated 31 July 2006), the Security Council demands that Iran shall suspend all enrichment-related and reprocessing activities.¹⁶⁶ The Security Council also notes that it would be beneficial for everybody, also for Iran, if the IAEA and Iran could cooperate in such a way that the IAEA could verify that Iran's nuclear programme is for exclusively peaceful purposes.

At the same time, Iran was also offered some 'carrots'. Several countries promised to provide nuclear fuel, thereby removing any need for Iranian enrichment, as well as various kinds of cooperation programmes, if Iran would comply with Resolution 1696. Nevertheless, Iran decided not to meet the terms of this resolution, thereby increasing fears that its nuclear programme had not only a peaceful purpose.

With Resolution 1737 (dated 23 December 2006)¹⁶⁷ and the following Resolution 1747 (dated 24 March 2007)¹⁶⁸, the Security Council decided to impose sanctions on Iran in accordance with Article 41 of the UN Charter. These sanctions are primarily aimed at stopping countries from cooperating with, and thereby contributing to, Iran's nuclear programme.

These sanctions are consequently of a rather mild kind, and their political and symbolic significance is probably greater than their material impact. It should be noted that the Iranian leadership, with its erratic and contradictory economic policy, certainly creates much more problems for

¹⁶⁶ See the UN website at <http://www.un.org/> > "Peace & security" > "Security Council" > "Resolutions" > "2006" (link http://www.un.org/Docs/sc/unsc_resolutions06.htm).

¹⁶⁷ *Ibid.*

¹⁶⁸ See the UN website at <http://www.un.org/> > "Peace & security" > "Security Council" > "Resolutions" > "2007" (link http://www.un.org/Docs/sc/unsc_resolutions07.htm).

the Iranian economy and the Iranian people than the current UN sanctions. The kind of sanctions introduced so far by the Security Council will therefore not suffice to get the Iranian leadership to change its mind.¹⁶⁹

Late in the Autumn 2007, we therefore had the US (the Bush administration) pressing for more biting sanctions, and many high-ranking Americans also openly advocated the use of military force against Iran's nuclear facilities, if possible under a UN Article 42 mandate, if not unilaterally.¹⁷⁰ In the latter case, the US may even argue that it has carried out such actions in the global interest, but however noble such intentions may be, it is still the UN Security Council – and not an individual country, even if that country happens to be the world's most powerful nation – that has the sole responsibility and right to decide about such measures, if they are to be in accordance with international law.

Many other countries as well as the IAEA, while critical of the Iranian nuclear programme, rejected the view that there was an urgent need to use military force, and feared that military attacks against Iran might start a new all-embracing war in the Middle East, with unforeseen consequences. If some members of the Security Council were, and still are, hesitant about more embracing sanctions, they would presumably be even more hesitant about mandating, and giving legality to, military actions. Some of the arguments currently used by the US are quite similar to the arguments used a few years ago against Iraq, which also makes it more difficult for the US to get the necessary political and diplomatic support for a Security Council resolution advocating a military solution.¹⁷¹

¹⁶⁹ “The big squeeze: But sanctions are not yet painful enough to change Iran's nuclear policy – A special report on Iran”, *The Economist* 21 July 2007.

¹⁷⁰ See *Wikipedia.org* - “Support for military action against Iran” > http://en.wikipedia.org/wiki/Support_for_military_action_against_Iran. See also James Phillips: “Don't Count on the Security Council to Curb Iran's Nuclear Ambitions”, The Heritage Foundation WebMemo #1370 (26 February 2007) > <http://www.heritage.org/Research/Iran/wm1370.cfm>.

¹⁷¹ See *Wikipedia.org* - “Opposition to military action against Iran” > http://en.wikipedia.org/wiki/Opposition_to_military_action_against_Iran. While the Internet is full of articles arguing for or against military attacks against Iran, a pamphlet published by the “Campaign Against Sanctions and Military Intervention in Iran” (CASMI), *Fact Sheets of Iran-US Standoff: Twenty Reasons against Sanctions and Military Intervention in Iran*, gives a good

The publication in December 2007 by the Director of National Intelligence (DNI) of a new report on Iranian nuclear intentions and capabilities then radically changed the agenda. The report states "...that in fall 2003, Tehran halted its nuclear weapons program...".¹⁷² Such a conclusion naturally makes it almost impossible – politically as well as legally – for the US to rally support for and justify any unilateral military actions against Iran.¹⁷³ This does not mean that a US unilateral attack can be ruled out, and some supporters of a US military attack continue to argue for such an option, questioning the conclusion of the DNI report.¹⁷⁴

Self-defence and pre-emption

As was noted above, international law allows a country to defend itself, and in some cases also the right to use pre-emptive force as a means of such self-defence, then called 'anticipatory self-defence'. The question therefore arises whether US military attacks on the Iranian nuclear facilities could be seen as permitted self-defence, in theory the second way in which such attacks could be in accordance with international law. It is also possible that the US would try to justify possible attacks on Iran

summary of the arguments against such an option >

<http://www.campaigniran.org/casmii/?q=node/2093>.

¹⁷² The report is available at the DNI website at <http://www.dni.gov/index.htm> > "Press Releases" (direct link http://www.dni.gov/press_releases/press_releases.htm). See also Anthony H. Cordesman: "Understanding the Key Judgments in the New NIE on Iranian Nuclear Weapons", *CSIS* 4 December 2007 >

http://www.csis.org/component/option,com_csis_pubs/task,view/id,4227/type,1/.

¹⁷³ See leader article "Nuclear proliferation" and article "Iran's nuclear programme", *The Economist* 2 February 2008.

¹⁷⁴ John Bolton, former US Ambassador to the UN, has been one of the strongest advocates of bombing and taking military actions against Iran, not only for halting Iran's nuclear programme, but also with the aim of bringing down the Iranian government (so-called regime change). See articles like - "Bolton calls for bombing of Iran", *The Guardian (UK)* 30 September 2007 > <http://www.guardian.co.uk/politics/2007/sep/30/conservatives.iran>. - "The Flaws in the Iran Report"; > http://www.aei.org/scholars/filter.all,scholarID.121,type.1/pub_list.asp.

as permitted self-defence, particularly if the Security Council will not provide the needed mandate.¹⁷⁵

It should also be noted that during recent years, the concept of pre-emptive attacks has been given a more important role in US security policy. In September 2002, President Bush presented a new national security policy (NSS 2002), which advocated pre-emptive attacks when the US, or its allies, are threatened by terrorists or by rogue states engaged in the production of weapons of mass destruction. While the NSS 2002 policy acknowledges that cooperation with other countries would be valuable in such cases, it states that lack of support or opposition from other states should not be allowed to hinder any pre-emptive actions and the US could and should therefore take unilateral military action against perceived threats.¹⁷⁶

It is highly doubtful whether this rather aggressive Bush doctrine of pre-emption is in accordance with international law; it certainly stretches the concept of permitted pre-emption, as part of self-defence, to its very limit.¹⁷⁷ That the strategy goes beyond traditional concepts of law is even recognised in NSS 2002, which states that "...Legal scholars and international jurists often conditioned the legitimacy of pre-emption on the existence of an imminent threat—most often a visible mobilization of armies, navies, and air forces preparing to attack. We must adapt the concept of imminent threat to the capabilities and objectives of today's adversaries..." (Chapter V, page 15). The adoption of such a policy is therefore but one of many examples that the present Bush administration does not pay too much attention either to previous US security policies, traditional international law, existing treaties or the opinions of international organisations or other countries.

¹⁷⁵ Paul Reynolds: "Would an attack on Iran be legal?", BBC News May 2006 > http://news.bbc.co.uk/2/hi/middle_east/4754009.stm.

¹⁷⁶ The policy document *The National Security Strategy of the United States of America* is available at the White House website > <http://www.whitehouse.gov/nsc/nss.html>.

¹⁷⁷ See Louise-Philippe Rouillard: "The Caroline Case: Anticipatory Self-Defence in Contemporary International Law", *Miskolc Journal of International Law*, Vol. 1. (2004) No. 2, pp. 104-120 > <http://www.uni-miskolc.hu/~wwwdrint/20042rouillard1.htm>. See also Abdul Ghafur Hamid: "The Legality of Anticipatory Self-Defence in the 21st Century World Order: A Re-Appraisal [Abstract], *Netherlands International Law Review* (2007), 54:441-490 > <http://journals.cambridge.org/action/displayAbstract?fromPage=online&aid=1581792>.

In addition, it could also be argued that the doctrine is not compatible with domestic American laws, as it gives the President new powers to take military actions, while the Constitution states that is Congress, and not the President, which has the right to declare war.¹⁷⁸

Thus, in its extreme version, the Bush doctrine says that the US President should have the option of taking military action against any perceived threat, anytime and everywhere, and do so unilaterally, without being influenced by any objections. It would be interesting to know what President Bush thinks of other countries adopting the same security strategy, if they, in a similar manner, were to state that they also have the right to take military actions against what they see as threats. What would President Bush say if Iran claimed that it had the right to use 'pre-emptive self-defence' against a threatening USA?

The kind of pre-emption (anticipatory self-defence) permitted by international law is of a much more limited kind than the kind of pre-emption envisaged in the Bush doctrine. A classical precedent is the so-called 'Caroline Affair' in 1837 between the US and Canada. Some rebels in Canada opposing British rule were given logistical support by some groups in the US, using a boat called 'Caroline'. When British forces learned that the rebels were planning an offensive against them, they crossed the border, destroyed the ship and killed some Canadian rebels as well as some Americans. The incident strained relations between the US and Britain, but was resolved after some years. Daniel Webster, then US Secretary of State, noted in this context some preconditions that should be met before a forcible reaction, like the British intervention, is undertaken: there must be "...a necessity of self-defence, instant, overwhelming, leaving no choice of means, and no moment for deliberation". The intervention should also be proportional to the threat, and not be "...unreasonable or excessive, since the act justified by the necessity of self-defence must be limited by that necessity and kept clearly within it". These criteria have since been used as a guiding principle for whether pre-emption is permitted or not.¹⁷⁹ (It can be added

¹⁷⁸ Jeremy Brecher and Brendan Smith: "Attack Iran, Ignore the Constitution", *The Nation (website)*, Posted 21 April 2006 > http://www.thenation.com/doc/20060508/attack_iran.

¹⁷⁹ See Eek, Bring, Hjermer, op. cit. Chapter XI.B; and Bring, op. cit. Chapter I.6; Strömberg and Melander, op. cit. Chapter 8.2; Bring, op. cit. Chapter I.6. See also *Wikipedia.org* - "Caroline affair" > http://en.wikipedia.org/wiki/Caroline_affair.

that Japan tried to justify its attack on Manchuria in 1931-32 and Italy its attack on Abyssinia in 1935 as 'anticipatory self-defence', although the League of Nations refuted those arguments and stated that both Japan and Italy had violated international law with their attacks.)¹⁸⁰

Perhaps the best modern example of permitted pre-emption relates to the June War of 1967 when, after a massive Arab military build-up and the Egyptian blockade of the Straits of Tiran, Israel managed to destroy the Egyptian Air Force in a pre-emptive attack. It is worth noting that when the UN passed several resolutions in the aftermath of the June War, Israel was never condemned for its attack on the Egyptian Air Force.¹⁸¹ Also permitted in line with the noted 'Caroline precedent' are the Israeli pre-emptive strikes at various Palestinian and other enemy guerrilla camps in neighbouring countries, when it has been clear that these camps have been the bases for realised or planned terrorist attacks against Israel. Similarly, if it could be established that there were some bases or other facilities in Iran that were directly linked to attacks in Iraq, Iraqi, American or Coalition forces would also have the right to attack such bases in Iran as 'pre-emptive self-defence'. However, such attacks by the US should only target some specific terrorist facilities, and could not cover Iranian nuclear facilities.

The Israeli attack in September 1981 on the Iraqi nuclear reactor Osirak is somewhat more problematic from the point of view of international law. In 1977, France sold a nuclear reactor to Iraq, as well as some highly enriched uranium. The reactor was monitored by the IAEA (Iraq having signed the NPT), but there were still some fears that these inspections were inadequate, and that Iraq could use the reactor for creating nuclear weapons. Shortly after the outbreak of the Iran-Iraq War in 1980, Iran made an air-strike against the reactor, though it did not manage to destroy it. However, the Israeli attack in 1981 was more successful,

¹⁸⁰ Bring., op. cit., page 165-66.

¹⁸¹ Bring, op. cit. Page 58-59. See also Louis Rene Beres: "Israel, Iran And Preemptive Attack Striking First Under International Law", *The Jewish Press* 17 November 2004 > http://www.jewishpress.com/displayContent_new.cfm?mode=a§ionid=20&contentid=16893&contentName=Israel,%20Iran%20And%20Preemptive%20Attack%20Striking%20First%20Under%20International%20Law.

destroying most of the facility. The reactor was then completely demolished during the (First) Gulf War in 1990.¹⁸²

The Israeli justification for the attack, as pre-emptive self-defence against a hostile nuclear weapons programme, was not recognised by the UN Security Council, which condemned Israel in its Resolution 487.¹⁸³ (The passing of this resolution means of course that none of the permanent states, including the US, vetoed the resolution.) However, no similar condemnation was made of the (failed) Iranian attack on Osirak in 1980, nor of the following seven Iraqi attacks on the Iranian nuclear facility at Bushehr between 1984 and 1988. These mutual Iranian-Iraqi attacks could perhaps be seen as part of the overall Iran-Iraq War, not requiring any specific condemnation, and as far as we know, were not justified as 'pre-emptive self-defence'. (Similarly, the final destruction of Osirak in 1990 was of course not condemned, as the whole US war effort was then based on a UN mandate.)

From a legal point of view, a general conclusion of the Israeli attack in 1981 would therefore be that international law does not allow a country to unilaterally destroy nuclear facilities in other countries as pre-emptive self-defence and that unilateral US military attacks on Iranian nuclear facilities would violate international law.

For at least two reasons, US attacks on Iranian nuclear facilities would be even harder to justify, at least as 'pre-emptive self-defence', than the condemned Israeli attack in 1981. First, a warlike situation existed between Israel and Iraq, while the US and Iran, though not the best of friends, are not in a state of open war with each other. Assuming that Iraq and Iran had nuclear weapons, it is certainly easier to think of a scenario where Iraq would use its weapons against Israel than a scenario where Iran would use its nuclear weapons against the US, meaning that Israel in 1981 had more valid reasons to pre-empt and attack Osirak than the US currently would have in attacking Iranian facilities. In today's world, neither Israel nor the US would have any legal right to attack Iranian

¹⁸² See *Wikipedia.org* - "Osirak" > <http://en.wikipedia.org/wiki/Osirak>; and *Wikipedia.org* - "Operation Opera" > http://en.wikipedia.org/wiki/Operation_Opera.

¹⁸³ See the UN website at <http://www.un.org/> > "Peace & security" > "Security Council" > "Resolutions" > "1981" (link <http://www.un.org/Docs/scres/1981/scres81.htm>). See also Bring., op. cit., page 59.

facilities, but it can be debated whether Israel would again have a slightly stronger case for pre-emption than the US.¹⁸⁴

Second, it must also be noted that the Israeli attack was carried out in a 'surgical' manner, with little damage, only about ten casualties, thereby probably meeting the criteria of proportionality. The Israeli attack was carried out before Osirak had become operational, meaning that the attack caused no radioactive leakage. A US attack would probably be harder to justify, also on this latter point. One could here think of various options, whether a US attack for instance would only target the enrichment facilities at Natanz or also comprise the facilities at Isfahan, Arak and Bushehr and perhaps some other facilities as well. US military strikes may also include various command and control centres and defence establishments, in order to minimise Iranian resistance. In order to be successful in destroying all Iranian nuclear facilities, the US would certainly need to use much more force than Israel did in 1981, thereby causing much more damage and deaths. Some studies (e.g. by the Oxford Research Group) have talked of tens of thousands of casualties if the US bombed Iran's nuclear sites. If, in order to be successful, the US decided that it would be necessary to use nuclear weapons, such as earth-penetrating 'bunker buster' bombs, the radioactive fallout would become even more disastrous.¹⁸⁵ Such attacks would presumably not only violate

¹⁸⁴ John Bolton, op. cit., argues that Israel must now consider taking military actions against Iranian nuclear facilities, as the publication of the National Intelligence Estimate has dramatically reduced the likelihood of American use of force. See Ron Bousso: "Israel may have to take military action against Iran: Bolton", *news.yahoo*, 21, January 2008 > http://news.yahoo.com/s/afp/20080121/pl_afp/mideastisraeliranuclearpoliticsbolton.

¹⁸⁵ Anthony H. Cordesman and Khalid R. Al-Rodhan: "Iranian Nuclear Weapons? The Options if Diplomacy Fails", CSIS Working Draft, 7 April 2006 > http://www.csis.org/component/option,com_csis_pubs/task,view/id,3037/type,1/; Peter Baker, Dafna Linzer, Thomas E. Ricks: "US Is Studying Military Strike Options on Iran", *washingtonpost.com* 9 April 2006 > http://www.washingtonpost.com/wp-dyn/content/article/2006/04/08/AR2006040801082_pf.html; Larisa Alexandrovna and Muriel Kane: "Study: US preparing 'massive' military attack against Iran", *The Raw Story* 28 August 2007 > http://rawstory.com/news/2007/Study_US_preparing_massive_military_attack_0828.html; Paul Rogers: "Iran: Consequences of a War", *Oxford Research Group Briefing papers*, February 2006 > http://www.oxfordresearchgroup.org.uk/publications/briefing_papers/iranconsequences.php; Thomas Harding: "'10,000 would die' in A-plant attack on Iran", *telegraph.co.uk* 13 February 2006 > <http://www.telegraph.co.uk/news/main.jhtml?xml=/news/2006/02/13/wiran13.xml&sSheet=/news/2006/02/13/ixworld.html>; Marshall Brain: "How Bunker Busters Work", *science.howstuffworks.com* 3 April 2003 > <http://science.howstuffworks.com/bunker-buster.htm>;

international law in general, but also several IAEA conventions on ensuring nuclear safety and preventing damage from radioactive waste.

It is therefore obvious that there are no legal justifications for unilateral US attacks on Iranian nuclear facilities, and that such US actions would be a clear violation of international law. However as already noted, the present Bush Administration has not paid too much attention to international law, so a decision on whether to attack Iran will presumably be based on other factors than what a formal legalistic interpretation of international law would stipulate about such attacks. Should the World's most powerful state therefore attack Iran, such attacks would certainly, at least in the short run, further undermine the respect for international law, and make the world a little bit more anarchic and also insecure.

References

AEI (American Enterprise Institute: "The Flaws in the Iran Report".

December 6, 2007. URL:

http://www.aei.org/scholars/filter.all,scholarID.121,type.1/pub_list.asp.

Alexandrovna, Larisa and Kane, Muriel: "Study: US preparing 'massive' military attack against Iran". *The Raw Story*. August 28, 2007. URL:

http://rawstory.com/news/2007/Study_US_preparing_massive_military_attack_0828.html

Baker, Peter; Linzer, Dafna; and Ricks, Thomas E. Ricks: "US Is Studying Military Strike Options on Iran". *Washington Post*, April 9, 2006. URL:

http://www.washingtonpost.com/wp-dyn/content/article/2006/04/08/AR2006040801082_pf.html

"B61-11 Earth-Penetrating Weapon", *GlobalSecurity.org* 9 April 2006 >
<http://www.globalsecurity.org/wmd/systems/b61-11.htm>

Bleek, Philipp C.: "Nuclear Posture Review Leaks; Outlines Targets, Contingencies", *Arms Control Association (ACA) - Arms Control Today*, April, 2002. URL: http://www.armscontrol.org/act/2002_04/nprapril02.asp

Bouso, Ron: "Israel may have to take military action against Iran: Bolton", *AFP*. January 21, 2008 URL: <http://afp.google.com/article/ALeqM5gOZLSqmQDN-ZEM0MaLy1mhuH3N1g>

Brain, Marshall: "How Bunker Busters Work". *science.howstuffworks.com*, April 3, 2003. URL: <http://science.howstuffworks.com/bunker-buster.htm>

Beres, Louis Rene: "Israel, Iran And Preemptive Attack Striking First Under International Law", *The Jewish Press*, November 17, 2004. URL: http://www.jewishpress.com/displayContent_new.cfm?mode=a§ionid=20&contentid=16893&contentName=Israel,%20Iran%20And%20Preemptive%20Attack%20Striking%20First%20Under%20International%20Law

Brecher, Jeremy and Smith, Brendan: "Attack Iran, Ignore the Constitution", *The Nation (web site)*, Posted 21 April, 2006. URL: http://www.thenation.com/doc/20060508/attack_iran
Bring, Ove: *FN-stadgan och världspolitiken, Om folkrättens roll i en föränderlig värld*, Stockholm: Norstedts Juridik

"Campaign Against Sanctions and Military Intervention in Iran" (CASMII), *Fact Sheets of Iran-US Standoff: Twenty Reasons against Sanctions and Military Intervention in Iran*. URL: <http://www.campaigniran.org/casmii/?q=node/2093>.

CNN News: Source: <http://www.cnn.com/2007/POLITICS/12/03/iran.nuclear/index.html>.

Cordesman, Anthony H.: "Understanding the Key Judgments in the New NIE on Iranian Nuclear Weapons", *CSIS* 4 December 2007. URL: http://www.csis.org/component/option,com_csis_pubs/task,view/id,4227/type,1/

Cordesman, Anthony H. and Al-Rodhan, Khalid R.: "Iranian Nuclear Weapons? The Options if Diplomacy Fails". *CSIS Working Draft*, April 7, 2006. URL:

http://www.csis.org/component/option,com_csis_pubs/task,view/id,3037/type,1/

Cordesman, Anthony H.: Iran's Nuclear Program: UN and IAEA Reporting and Developments, *CSIS Working Draft*, 27 November 2007.

URL:

http://www.csis.org/component/option,com_csis_pubs/task,view/id,4186/type,1/

DNI (Director of National Intelligence): Source:

<http://www.dni.gov/index.htm> or URL:

http://www.dni.gov/press_releases/press_releases.htm).

The Economist, 21 July 2007: "The big squeeze: But sanctions are not yet painful enough to change Iran's nuclear policy – A special report on Iran"

The Economist 2 February, 2008: "Nuclear proliferation" and article "Iran's nuclear programme"

Eek, Hilding; Bring, Ove; and Hjerner, Lars: *Folkrätten*, Stockholm: Norstedts. 1987, 4th edition

Elbaradei, Mohamed; Nwogugu, Edwin; and Rames, John: "International law and nuclear energy: Overview of the legal framework", *IAEA Bulletin*, No 373. URL:

<http://64.233.183.104/u/IaeaORG?q=cache:q79MBxfYGkwJ:f40.iaea.org/worldatom/Periodicals/Bulletin/Bull373/rames>

ForeignPolicy.com - David Bosco's blog: "The legality of attacking Iran (international law version)". 8 February 2007. URL:

<http://blog.foreignpolicy.com/node/3516>

Geneva Conventions: URL:

<http://www.icrc.org/Web/Eng/siteeng0.nsf/htmlall/genevaconventions>

Global Security: "B61-11 Earth-Penetrating Weapon" April 9, 2006. URL:

<http://www.globalsecurity.org/wmd/systems/b61-11.htm>

Goldblat, Jozef: "No First Use of Nuclear Weapons", *Pugwash Meeting no. 279*. London, UK, 15-17 November 2002. Source:

<http://www.pugwash.org/reports/nw/goldblat.htm>.

The Guardian (UK): "Bolton calls for bombing of Iran". 30 September 2007

URL :<http://www.guardian.co.uk/politics/2007/sep/30/conservatives.iran>

Hamid, Abdul Ghafur: "The Legality of Anticipatory Self-Defence in the 21st Century World Order: A Re-Appraisal". *Netherlands International Law Review* Vol. 53, No. 3, 2007, pp. 441-490. URL: <http://journals.cambridge.org/action/displayAbstract?fromPage=online&aid=1581792>

Harding, Thomas: "'10,000 would die' in A-plant attack on Iran", *The Telegraph*. February 13, 2006. URL: <http://www.telegraph.co.uk/news/main.jhtml?xml=/news/2006/02/13/wiran13.xml&sSheet=/news/2006/02/13/ixworld.html>

The Heritage Foundation Background, No. 1961, 18 Aug 2006. URL: <http://www.heritage.org/Research/WorldwideFreedom/bg1961.cfm>

IAEA (International Atomic Energy Agency). Source: <http://www.iaea.org/>

International Committee of the Red Cross, ICRC: Source: <http://www.icrc.org/eng>

Kerr, Paul: "The Iran Nuclear Crisis: A Chronology", *Arms Control Association (ACA) Country Resources*. URL: <http://www.armscontrol.org/country/iran/iranchronology.asp>

Kleimann, David: "Positivism, the New Haven School, and the Use of Force in International Law". *BSIS Journal of International Studies* Vol. 3, 2006.

The National Security Strategy of the United States of America, September, 2002. Washington D.C.: The White House. URL: <http://www.whitehouse.gov/nsc/nss.html>

Phillips, James: "Don't Count on the Security Council to Curb Iran's Nuclear Ambitions". The Heritage Foundation WebMemo No. 1370, 26 February, 2007. URL: <http://www.heritage.org/Research/Iran/wm1370.cfm>.

Reynolds, Paul: "Would an attack on Iran be legal?". *BBC News*, May 2006. URL: http://news.bbc.co.uk/2/hi/middle_east/4754009.stm

Rogers, Paul: "Iran: Consequences of a War". *Oxford Research Group Briefing papers*, February, 2006. URL:

http://www.oxfordresearchgroup.org.uk/publications/briefing_papers/iranconsequences.php

Rouillard, Louise-Philippe: "The Caroline Case: Anticipatory Self-Defence in Contemporary International Law", *Miskolc Journal of International Law*, Vol. 1. No. 2, 2004, pp. 104-120. URL: <http://www.unimiskolc.hu/~wwwdrint/20042rouillard1.htm>

Strömberg, Håkan and Melander, Göran: *Folkrätt*, Studentlitteratur: Lund. 1989, 5th edition

Syracuse Law Review, Vol. 57, No. 465, 2007. Source: http://papers.ssrn.com/sol3/papers.cfm?abstract_id=1029660.

United Nations: *Basic Facts About the United Nations*, United Nations Publications 1998

UN activities concerning international law: Source: <http://www.un.org/english/> or <http://www.un.org/law/>

UN Charter: URL: <http://www.un.org/aboutun/charter/>.

"U.S. 'Negative Security Assurances' At a Glance", *Arms Control Association (ACA) Fact Sheet*. January, 2008. Source: <http://www.armscontrol.org/factsheets/negsec.asp>

Wikipedia.org - "Public international law". Source: http://en.wikipedia.org/wiki/Public_international_law

Wolfsthal, Jon: "Understanding Iran's Nuclear Maneuvers", *CSIS Commentary*, 12 January 2006. URL: http://www.csis.org/component/option,com_csis_progj/task,view/id,476/

Summary and Conclusions

This report makes a number of points on the consequences of an American attack on Iran's nuclear facilities. At the outset, the study posited two generic alternatives for an attack – the Go Small and the Go Big scenarios. Either alternative could of course be almost indefinitely varied and detailed, but as the prime focus of the analysis was on the consequences of an attack, we settled on these two big picture alternatives.

The focus of the Go Small scenario is a limited surprise attack based on sufficient intelligence on where to strike and with the aim of immediately stopping the progress of the nuclear programme. The focus of the Go Big scenario, on the other hand, is on a larger operation with more preparations in order to discontinue the nuclear programme for the longer term. The scenarios have been developed to be operationally both possible and plausible, but there is no probability attached to the likelihood of either scenario actually taking place. For the purposes of this study, it was sufficient that there was more than a zero-chance possibility that an operation would be launched during the period of study.

There are of course many uncertainties and very different political outcomes attached to the operations once they are under way, but the primary point of the scenarios was to set the scene for what could happen in the event of an attack. Consequently, the main objective of this study was not to assess the probability of either attack scenario, but to use them as a given in order to focus on the consequences of an attack. The US rationale behind keeping the option of an attack open is primarily that it increases pressure on the Iranian government to comply with the demands of the US government and the international community.

The American Armed Forces routinely develop a wide range of plans in order to have available options in the event of a contingency. It would therefore be remarkable had they not prepared plans for an attack against Iran. However, there has been a particularly strong signal to the Iranian government as the option of attacking Iran's nuclear facilities has been openly debated. Whether this discussion has been officially sanctioned

and initiated on the part of the American government to increase the pressure on Iran or whether it is a factor of media logic is difficult to verify. However, the outcome is the same. The discussion of this option has been part of increasing the pressure on Iran with the aim of tipping the scales of the Iranian government in favour of discontinuing its nuclear programme and modifying its Great Power ambitions in the region. Simultaneously, however, the Iranian government has been brought to the centre of world affairs and made the focal point of security issues in the Middle East. Irrespective of the real status of Iran's nuclear programme, the Iranian government has skilfully been able to increase its clout and prestige in the region without triggering an attack. There is no question of Iran's rising regional power status in the Middle East. Drawing the ire of the US government and risking an attack have obviously not been enough to deter or change the behaviour of the Iranian government. However, on the brink of conflict, a very small miscalculation or lack of discipline in the Iranian military ranks could arguably have brought a completely different outcome by triggering an attack on the nuclear facilities.

There is a wide scope of potential consequences regardless of whether attacks are deemed a success or failure. What may be deemed a success in discontinuing the nuclear programme may be deemed a failure in terms of, for example, human rights, future power struggles in the Middle East or from an economic point of view. The major problem with an attack, be it successful or not with regard to the future of Iran's nuclear programme, is that it would make it harder for modernising and reform-orientated forces in Iran to operate and find traction for their ideas and agenda. An attack is likely to further empower the present Iranian government and elites and diminish the role and strength of dissenters in Iran. The National Intelligence Estimate (NIE), which at the end of 2007 concluded that Iran was years away from constructing a nuclear bomb, is interesting in this respect. The US intelligence report, at least temporarily, brought Iran out of the limelight of international affairs. Iran has responded with military posturing and aborted attacks on American navy vessels in the Persian Gulf. One interpretation is that an external enemy has been very beneficial to Iran's government and served an important role in propping up the Iranian regime and elites. When the threat of an external enemy disappears or diminishes, the position and legitimacy of the government

and elites come under threat as popular attention turns to domestic affairs. In this respect and to some extent counterintuitively, the NIE may actually have further increased the pressure on Iran's government in forcing its next move.

Appendix 1. Background Data on Iranian Energy Developments

Bengt-Göran Bergstrand

This appendix presents and discusses some general background data on Iranian energy developments, particularly for the two dominant sources oil and natural gas.¹⁸⁶ Most statistical data are taken from the BP *Statistical Review of World Energy*, June 2007 edition. For a number of years, BP has published such reviews, which are available both in print and on the Internet, at the BP website at <http://www.bp.com/home.do?categoryId=1> (see <http://www.bp.com/productlanding.do?categoryId=6848&contentId=7033471>).

Iran – A brief energy profile

Iranian reserves of both oil and natural gas are the second largest in the world, and Iran ranks as the fourth largest producer of both oil and natural gas. Oil and natural gas each accounts for about 49% of Iran's total energy consumption, with coal and hydroelectricity representing the remaining 1-2%.¹⁸⁷ The importance of the Iranian oil sector could, on one hand, be summarised by noting that oil accounts for about 20% of Iranian GDP, 60% of central government revenues and 80% of Iran's exports.¹⁸⁸ On the other hand, it should also be noted that Iran has a more diversified and less oil-dependent economy than many other countries in the Middle East, as Iran also has an important agricultural and industrial sector.

¹⁸⁶ At the FOI Conference on 10-11 October 2007, a compendium with such data had been prepared for the Conference participants.

¹⁸⁷ "Iran – Country Analysis Briefs", *Energy Information Administration, EIA/ US Department of Energy* > <http://www.eia.doe.gov/emeu/cabs/Iran/Background.html>. See also *Wikipedia.org* - "Energy in Iran" > http://en.wikipedia.org/wiki/Energy_of_Iran.

¹⁸⁸ Moin Siddiqi: "Economy", Iran; *The Middle East and North Africa 2007 – Europa Regional Surveys of the World*, Routledge 2007, page 414.

Iranian Oil Reserves

Table 1 below provides some data on oil reserves in the twenty largest countries, ranked by size. Total world reserves in 2006 have been assessed to about 1 208 billion barrels.¹⁸⁹ Considering that about 30 billion barrels of oil were consumed in 2006 (see below), this means that present known reserves would, in theory, suffice to 40 years of consumption.

Most of these oil reserves are found in the Middle East, and Middle Eastern reserves amount to about 742 billion barrels, or 61% of total global reserves. The Iranian reserves are currently the second largest in the world, or about 11% of total global reserves. The Iranian reserve position has also been improved during recent years. Throughout the late 1990s, Iraq, Kuwait and the United Arab Emirates were reported to have larger reserves than Iran, but new Iranian discoveries in early 2000 (Dasht-e-Abadan and Azadegan) meant that Iranian reserves have become second only to those of Saudi Arabia.¹⁹⁰

Table A1: Proven oil reserves (billions of barrels) in the twenty largest oil producing countries in 2006. (Source: BP Review 2007)

(1)	Saudi Arabia	264,3	(11)	USA	29,9
(2)	Iran	137,5	(12)	Canada	17,1
(3)	Iraq	115,0	(13)	China	16,3
(4)	Kuwait	101,5	(14)	Qatar	15,2
(5)	United Arab E.	97,8	(15)	Mexico	12,9
(6)	Venezuela	80,0	(16)	Algeria	12,3
(7)	Russian Fed.	79,5	(17)	Brazil	12,2
(8)	Libya	41,5	(18)	Angola	9,0
(9)	Kazakhstan	39,8	(19)	Norway	8,5
(10)	Nigeria	36,2	(20)	Azerbaijan	7,0

¹⁸⁹ See also "International Petroleum (Oil) Reserves and Resources Tables and Reports - Oil Proved Reserves, All Countries (Billion Barrels): January 1, 1980 - January 1, 2008 Estimates", Energy Information Administration, EIA/ US Department of Energy > <http://www.eia.doe.gov/emeu/international/oilreserves.html>.

¹⁹⁰ BP review..., op. cit.; and Moin Siddiqi, op. cit.

Iranian oil production and consumption

Global oil production has steadily increased since the early 1980s, from ~57 mbpd to the current level of ~82 mbpd.¹⁹¹ Figure A1 illustrates production trends for the major oil producers and some other countries.

The three main oil producing countries are Saudi Arabia, Russia and the United States. Saudi Arabia doubled its oil production during the second half of the 1980s, and has been the biggest oil producer in the world since 1992. Russian (Soviet) production declined in the late 1980s and first half of the 1990s, but has grown since the late 1990s. [This growth of oil production together with a higher oil price has greatly improved Russian export earnings and Russian economic growth, and thereby boosted the popularity of the Russian political leadership and President Putin.]

The trend for the United States differs from those of the other two major oil producers. While both Saudi Arabia and Russia produce much more oil than they consume, and are therefore important exporters, the United States is the world's largest importer of oil. In the United States, oil consumption has grown while oil production has declined, thereby creating a growing demand for imported oil.

¹⁹¹ See also "International Petroleum (Oil) Production Tables - Total Oil Supply: All Countries, Most Recent Annual Estimates, 1980-2006", *Energy Information Administration, EIA/ US Department of Energy* > <http://www.eia.doe.gov/emeu/international/oilproduction.html>.

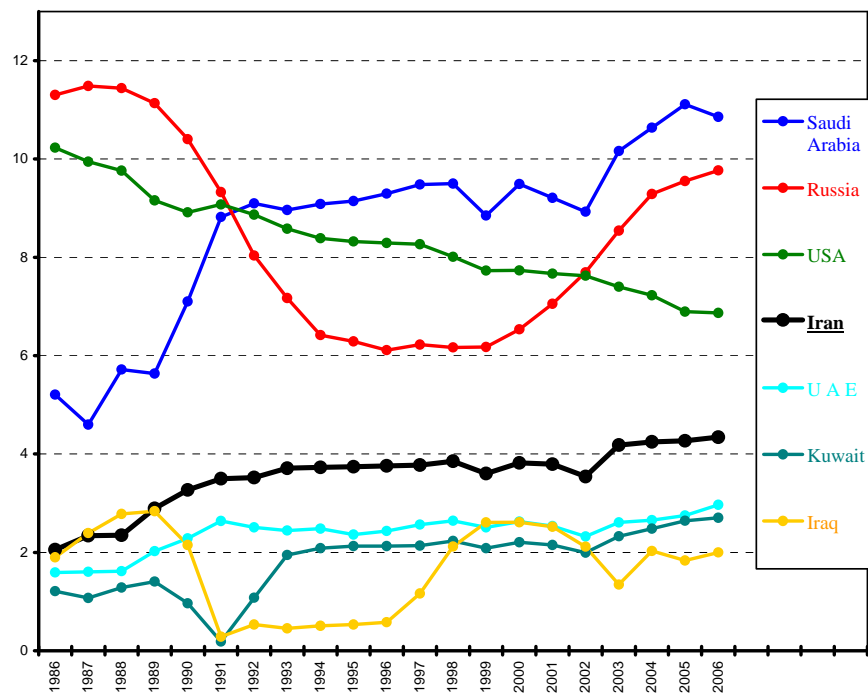


Figure A1: Oil production (mbpd) by major oil producers 1986-2006. (Source: BP Review 2007).

Iran ranks fourth among the world's oil producers and since 1990, Iranian oil production has exceeded Iraqi oil production. Both Iraqi and Kuwaiti oil production dropped to nothing during the Gulf War in 1990-91, and Iraqi production remained at a low level during much of the 1990s. During the second half of the 1990s, Iraqi oil production was able to expand through the UN Oil for Food Programme, but then experienced another decline during the Iraq War in 2003.

Iran has been producing oil since the early 1900s and has been exporting oil since 1913. Since oil was nationalised in the 1950s, the National Iranian Oil Company (NIOC) has been responsible for Iranian oil production.¹⁹²

¹⁹² See [Wikipedia.org](http://www.nioc.ir/index.html) - "National Iranian Oil Company" NIOC homepage > <http://www.nioc.ir/index.html>.

Figure A2 illustrates Iranian oil developments. Iranian production is much larger than domestic consumption, and Iran currently exports about 2.5 mbpd, mostly to other Asian countries such as Japan, China, India and South Korea.¹⁹³

Iranian oil production increased rapidly during the second half of the 1960s and the early 1970s, peaking at a level of some 6.1 mbpd in 1974, when Iranian oil production represented more than a tenth of global production. Production then declined, and dropped more after the outbreak of the Iranian Revolution and the Iran-Iraq War, to its lowest level of 1.3 mbpd in 1981.

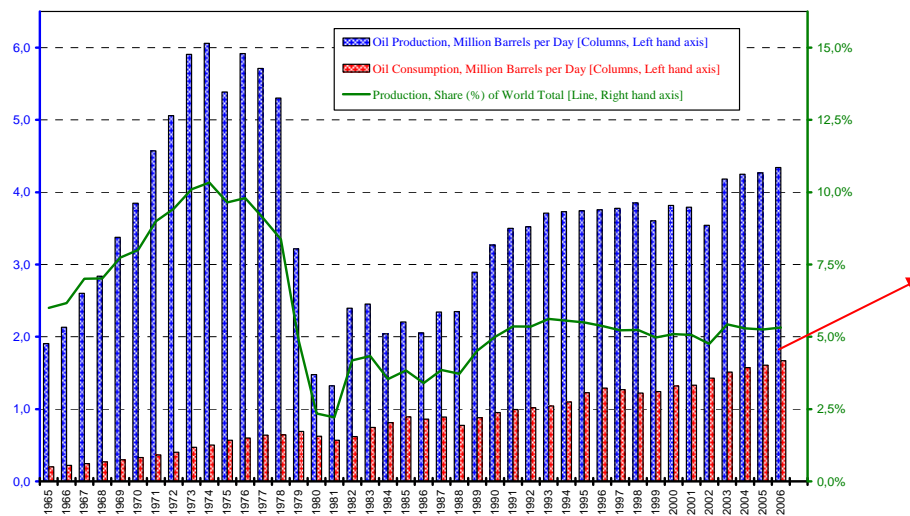


Figure A2: Iranian oil production and consumption (mbpd) 1965-2006.
(Source: BP Review 2007).

During the following years, Iran was able to increase production to more than 2 mbpd, but it was basically after the cessation of hostilities in August 1988 that Iran was able to raise production, to a level of about 3.7 mbpd in the early 1990s.

During recent years, Iranian production has exceeded 4 mbpd, which means that Iranian oil production represents about 5% of global oil

¹⁹³ See "Iran – Country Analysis Briefs", EIA, op. cit.

production. According to some Iranian plans, Iranian oil production should be increased to 5.4 mbpd in 2010 and 7 mbpd in 2015, with the ultimate goal of reaching a level of 8 mbpd in 2020.¹⁹⁴

The Iranian oil situation is, however, not without problems. While Iran certainly has sufficient reserves in the ground, much new investment will be needed to exploit the newly discovered sources.¹⁹⁵ The oil sector also suffers from a lack of maintenance, and parts of the Iranian oil infrastructure have still not recovered completely from the damage suffered during the Iran-Iraq war, so it is far from certain that the stipulated production plans could be realised. US sanctions against companies co-operating with Iran have also made it more complicated, though not impossible, for Iran to collaborate and get technical assistance from other countries.

Oil consumption has also risen steadily. Should consumption continue to grow at its present pace, it could reach a level of around 3-3.5 mbpd by 2020. In Figure A2, a simple red arrow has been added to illustrate this trend. If production then stagnates, or even declines slightly back to its 1990 level of 3.7 mbpd, this would suggest that Iran would no longer be a major oil exporter but rather an oil importing country (extend both the time axis and the red arrow to the edge of the diagram to get an understanding of such a scenario).¹⁹⁶ Iran would then resemble Indonesia, where a steadily increasing consumption of oil has reached the same level as a declining production of oil.¹⁹⁷

The rapid growth of Iranian oil consumption could also be explained by faulty energy policies. For political reasons, the Iranian government subsidises a lot of basic commodities, including petrol, thereby creating a wasteful use of energy and a demand surplus as well as a huge government outlay, which could certainly be better spent on other

¹⁹⁴ See Moin Siddiqi, op. cit., page 415.

¹⁹⁵ See Hooman Peimani: "Middle East: Iran's oil bonanza and its problems", *Asia Times Online* 18 July 2003 > http://www.atimes.com/atimes/Middle_East/EG18Ak05.html.

¹⁹⁶ See *Wikipedia.org* - "Ministry of Petroleum of Iran" > http://en.wikipedia.org/wiki/Ministry_of_Petroleum_of_Iran; this article refers to another interesting article, Roger Stern: "The Iranian petroleum crisis and United States national security", *Proceedings of the National Academy of Sciences of the United States of America, PNAS* January 2, 2007 > <http://www.pnas.org/cgi/reprint/104/1/377>.

¹⁹⁷ As Indonesia is no longer an important net exporter of oil, its membership of OPEC has been subject to review. See *Wikipedia.org* - "OPEC" > <http://en.wikipedia.org/wiki/OPEC>.

programmes. The Iranian petrol price, of about 9 US cents per litre, is thought to be the lowest in the world. The World Bank has reported that these energy subsidies amount to about 10% of Iran's GDP.¹⁹⁸ In this context, it should also be noted that domestic demand, partly for this reason, greatly surpasses Iran's domestic refining capacity, thereby forcing Iran to import refined oil products such as petrol and diesel.¹⁹⁹

If we assume that Iran would be able raise its oil production according to the stipulated plans, such a development could create other problems. Even if global demand for oil grows, primarily because of increased demand in the United States and China, and production by some non-OPEC countries stagnates, for instance in the North Sea area, it is not certain that other members of the OPEC would be too happy about over-rapidly increasing Iranian oil production and exports.

Iranian natural gas reserves

Table A2 provides some data on natural gas reserves in the twenty largest gas producing countries, ranked by output. Total global reserves in 2006 were estimated at about 181 trillion cubic metres.²⁰⁰

Considering that about 2.85 trillion cubic metres were consumed in 2006 (see below), this means that current known gas reserves would, in theory, suffice for nearly 65 years of consumption.

Russia has the largest reserves of natural gas in the world, with about 26% of total global reserves. Natural gas reserves in the Middle East amount to about 73 trillion cubic metres, or 40% of total global reserves. This Middle Eastern share of total global reserves has gradually grown, as large new discoveries of natural gas have been made, particularly in Qatar. The Iranian reserves are currently the second largest in the world,

¹⁹⁸ "Iran: Country Brief", *World Bank* >

<http://web.worldbank.org/WBSITE/EXTERNAL/COUNTRIES/MENAEXT/IRANEXTN/0,,menuPK:312966~pagePK:141132~piPK:141107~theSitePK:312943,00.html>. See also "(Text box 3) Iran's Subsidy System", *IMF Country Report* 07/100, 8 March 2007, page 14 > <http://www.imf.org/external/pubs/cat/longres.cfm?sk=20535.0>.

¹⁹⁹ See "Iran – Country Analysis Briefs", EIA, op. cit; and Moin Siddiqi, op. cit., page 417.

²⁰⁰ See also "International Natural Gas Reserves and Resources Tables and Reports - Natural Gas Proved Reserves, All Countries (Trillion Cubic Feet): January 1, 1980 - January 1, 2008 Estimates", *Energy Information Administration, EIA/ US Department of Energy* > <http://www.eia.doe.gov/emeu/international/gasreserves.html>.

or about 15.5% of total global reserves. Important new Iranian discoveries have been made in the off-shore South Pars field (close to Qatar's North Pars field, the Pars field being the largest gas field in the world).²⁰¹

Table A2: Proven natural gas reserves (trillion cubic metres) in the twenty largest gas producing countries 2006. (Source: BP Review 2007)

(1)	Russian Fed.	47,7	(11)	Kazakhstan	3,0
(2)	Iran	28,1	(12)	Norway	2,9
(3)	Qatar	25,4	(13)	Turkmenistan	2,9
(4)	Saudi Arabia	7,1	(14)	Indonesia	2,6
(5)	United Arab Em	6,1	(15)	Australia	2,6
(6)	USA	5,9	(16)	Malaysia	2,5
(7)	Nigeria	5,2	(17)	China	2,4
(8)	Algeria	4,5	(18)	Egypt	1,9
(9)	Venezuela	4,3	(19)	Uzbekistan	1,9
(10)	Iraq	3,2	(20)	Kuwait	1,8

Iranian natural gas production and consumption

Global natural gas production has steadily increased since the mid 1960s, from ~655 bcm cubic metres to the current level of ~2 850 bcm (billion cubic metres).²⁰² The trend line for global natural gas production has also been more steady than for oil, as global oil production actually declined after both the first oil crisis in 1973-74 and the second oil crisis in 1979-80.

Figure A3 illustrates production trends for the major natural gas producers and a couple of other countries. Natural gas is either found together with oil at oil fields or at separate gas fields. An important difference between the two sources relates to transportation and distribution and storage, oil being a liquid and natural gas of course a gas. When found together with oil, this difficulty has often meant that natural gas was a waste product that had to be removed by flaring, and

²⁰¹ See "Iran – Country Analysis Briefs", EIA, op. cit; and Moin Siddiqi, op. cit., page 418.

²⁰² See also "International Natural Gas Production Tables: Dry Natural Gas Production, All Countries, Most Recent Annual Estimates, 1980-2006 (Trillion Cubic Feet)", *Energy Information Administration, EIA/ US Department of Energy* >
<http://www.eia.doe.gov/emeu/international/gasproduction.html>.

enormous quantities of natural gas were therefore destroyed in this manner.

Russia and the United States are the two main natural gas producing countries, with a production far above all other countries. There are some similarities between oil and natural gas developments. For Russia, the production trends are similar to those for oil, with a decline in the early 1990s that levelled off in the mid 1990s, and then increased from the late 1990s, although the changes for natural gas have been much less dramatic than for oil. Russian production of natural gas, like Russian production of oil, is far greater than Russian domestic consumption, meaning that Russia has a large surplus for export.

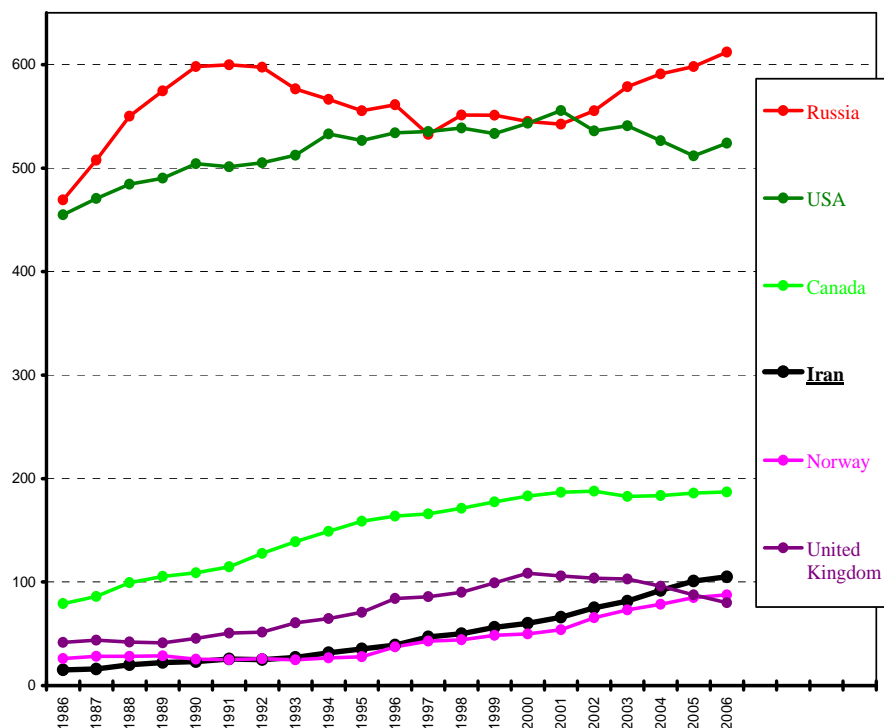


Figure A3: Natural gas production (billion cubic metres) by major producers 1986-2006. (Source: BP Review 2007).

While US oil consumption has steadily risen and oil production steadily declined, thereby creating a growing need for imports, US natural gas

consumption and production trends have to a greater degree followed each other, and US production of natural gas has not yet shown the same kind of steady decline as US oil production. US consumption of natural gas is still much larger than US gas production, meaning that the United States is not only the world's biggest importer of oil, but also the world's biggest importer of natural gas. However, most US gas imports come not from overseas but from Canada, the third largest gas producing country in the world.

Iran ranks fourth among the world's natural gas producers, with a production level comparable to the two North Sea producers Norway and the United Kingdom. Figure A4 shows Iranian natural gas developments. Iranian natural gas production has grown rapidly since the early 1980s, when production was at its lowest, and current production represents about 3.7% of total global production.

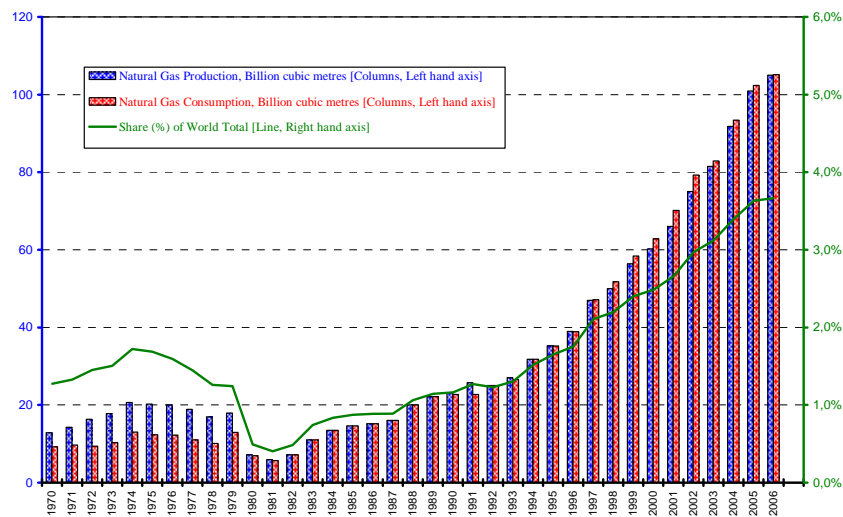


Figure A4: Iranian natural gas production and consumption (billion cubic metres) 1970- 2006
(Source: BP Review 2007).

During the 1970s, Iran also produced more natural gas than it consumed and was then a net exporter of natural gas. Following the Iranian Revolution and the outbreak of the Iran-Iraq war, production dropped rapidly and Iran also ceased to export natural gas. Since then, almost all

Iranian natural gas has been consumed domestically (shown in Figure A4 by the similar heights of the two columns for production and consumption), and during recent years consumption has even exceeded production, making Iran a net importer of natural gas.

However, Iran has ambitious plans for increasing its production of natural gas, thereby also becoming a major exporter of natural gas, not least because of the discovery of the giant Pars gas field.²⁰³ Already in 1996, Iran signed an agreement with the Turkish state oil company BOTAS to supply Turkey with natural gas by pipeline, and deliveries started in 2002. Eventually, Iran hopes to be able to export natural gas to Europe through Turkey. This agreement has been highly criticised by the US, and the US has also put pressure on both Turkey and Western companies to not make any deals with Iran.²⁰⁴ Other projects include the eastward so-called 'peace pipeline', which would supply Iranian natural gas to both Pakistan and India.²⁰⁵

Other plans include the construction of LNG (liquefied natural gas) processing facilities on-shore, close to the Pars gas field. By cooling and compressing natural gas to a liquid, LNG can be transported by special LNG carriers. According to Iranian plans, such exports to China and India and other Asian countries could begin in 2009 and comprise about 35 million cubic metres of liquefied natural gas a day, to be increased to 180 million cubic metres in 2020.²⁰⁶

²⁰³ See for instance M.A. Sarmadi-Rad (Director of Regional Economic Cooperation, MFA of Iran): "Iran's Strategy for Export of Natural Gas", *Statement at UN/ECE Session* January 2005 > www.unece.org/ie/se/pdfs/wpgas/countries/iran.pdf; and Heydat Omvidar: "Iran's Aggressive Natural Gas Expansion Plans", *Energy Tribune* 17 September 2007 > <http://www.energytribune.com/articles.cfm?aid=617#>.

²⁰⁴ Moin Siddiqi, op. cit., page 417; and *Wikipedia.org* - "Iran-Turkey pipeline" > http://en.wikipedia.org/wiki/Iran-Turkey_pipeline.

²⁰⁵ See *Wikipedia.org* - "Iran-Pakistan-India gas pipeline" > http://en.wikipedia.org/wiki/Iran-Pakistan-India_gas_pipeline.

²⁰⁶ Renee Lawrence: "Bloomberg: Iran Plans to Start Liquefied Natural Gas Exports in 2009", *Posted by Royal Dutch Shell Plc.com at February 14th, 2007* > <http://royaldutchshellplc.com/2007/02/14/bloomberg-iran-plans-to-start-liquefied-natural-gas-exports-in-2009/>.

Conclusion

Based on the statistical facts reviewed above, some tentative and brief conclusions can be drawn from a rather strict economic perspective, explicitly ignoring the political and strategic questions which otherwise have such a regrettable impact on most Middle Eastern issues.

As Iran has the second largest reserves of both oil and natural gas, Iran should be able to produce sufficient amounts of oil and natural gas to not only meet its domestic consumption but also make Iran a major exporter of such hydrocarbons. Using the classical trade theory of 'comparative advantage', Iran would have a natural position as an exporter both of oil and natural gas.

However, Iran is currently a net importer of natural gas and its position as a major oil exporter cannot be taken for granted, as domestic demand is increasing very rapidly. Against such a background, it is understandable if Iran also takes an interest in nuclear energy, and as a signatory of the NPT, Iran certainly has every right to develop nuclear technology (for peaceful purposes, that is).

What one could call 'Iranian energy policy' can still be criticised on several points. First, the huge amounts spent on energy subsidies, creating both an excess demand and waste, should be cut and abolished as soon as possible. With a less rapid increase in domestic consumption, Iran would have a less strained energy situation and larger amounts of oil would be available for export. Second, there is a good case for being opposed to nuclear power in general and to question the advisability of an Iranian nuclear energy programme. The monies spent by Iran on the nuclear programme, as well as on energy subsidies, could certainly be better used if invested in the oil and natural gas infrastructure, and also in alternative energy sources, such as wind and solar power.

It should also be noted that while the nuclear programme in itself represents an allocation of dubious value, the great cost of the Iranian nuclear programme is of an indirect nature. Without the nuclear programme and in particular a programme of the present kind, which also could be used for military purposes, Iran would not be subject to so much mistrust. If it had no nuclear programme, or at least a programme

designed to be impossible for use in military purposes, trading with other countries would be easier, and Iran would find it much easier to acquire the foreign investment and technology necessary for the development of the Iranian oil and natural gas sector.

References

- IMF Country Report* 07/100: "Iran's Subsidy System". March 8, 2007. URL: <http://www.imf.org/external/pubs/cat/longres.cfm?sk=20535.0>
- Lawrence, Renee: "Bloomberg: Iran Plans to Start Liquefied Natural Gas Exports in 2009". *Royal Dutch Shell*. February 14, 2007. URL: <http://royaldutchshellplc.com/2007/02/14/bloomberg-iran-plans-to-start-liquefied-natural-gas-exports-in-2009/>
- NIOC (National Iranian Oil Company). Source: <http://www.nioc.ir/index.html>
- Omvidar, Heydat: "Iran's Aggressive Natural Gas Expansion Plans". *Energy Tribune*, September 17, 2007. URL: <http://www.energytribune.com/articles.cfm?aid=617#>
- Peimani, Hooman: "Middle East: Iran's oil bonanza and its problems", *Asia Times Online*. July 18, 2003. URL: http://www.atimes.com/atimes/Middle_East/EG18Ak05.html
- Sarmadi-Rad, M.A. "Iran's Strategy for Export of Natural Gas", *Statement at UN/ECE Session*, January 2005. URL: www.unece.org/ie/se/pdfs/wpgas/countries/iran.pdf
- Siddiqi, Moin: "Economy". *Iran; The Middle East and North Africa 2007 – Europa Regional Surveys of the World*. London: Routledge. 2007
- Stern, Roger: "The Iranian petroleum crisis and United States national security". *Proceedings of the National Academy of Sciences of the United States of America, PNAS*. January 2, 2007. URL: <http://www.pnas.org/cgi/reprint/104/1/377>
- US Department of Energy*: "International Natural Gas Reserves and Resources Tables and Reports - Natural Gas Proved Reserves, All Countries (Trillion Cubic Feet): January 1, 1980 - January 1, 2008 Estimates", *Energy Information Administration, EIA*. URL: <http://www.eia.doe.gov/emeu/international/gasreserves.html>
- US Department of Energy*: "International Natural Gas Production Tables: Dry Natural Gas Production, All Countries, Most Recent Annual Estimates, 1980-2006 (Trillion Cubic Feet)", *Energy Information*

Administration, EIA. URL:

<http://www.eia.doe.gov/emeu/international/gasproduction.html>

US Department of Energy: "International Petroleum (Oil) Reserves and Resources Tables and Reports - Oil Proved Reserves, All Countries (Billion Barrels): January 1, 1980 - January 1, 2008 Estimates", Energy Information Administration, EIA. URL:

<http://www.eia.doe.gov/emeu/international/oilreserves.html>

US Department of Energy: "International Petroleum (Oil) Production Tables - Total Oil Supply: All Countries, Most Recent Annual Estimates, 1980-2006", Energy Information Administration, EIA. URL:

<http://www.eia.doe.gov/emeu/international/oilproduction.html>

US Department of Energy: "Iran – Country Analysis Briefs", Energy Information Administration, EIA. URL:

<http://www.eia.doe.gov/emeu/cabs/Iran/Background.html>

World Bank: "Iran: Country Brief".URL:

<http://web.worldbank.org/WBSITE/EXTERNAL/COUNTRIES/MENAEXT/IRANEXTN/0,,menuPK:312966~pagePK:141132~piPK:141107~theSitePK:312943,00.html>