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NOTES

1. The U.S.-China Business Council, US-China Trade Statistics and China's World Trade Statistics, http://www.uschina.org/statistics/tradetable.html.

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Blocking the Hormuz Strait: China's Energy Dilemma

By Yitzhak Shichor

Over the last few weeks Iran has amplified its threats that, if attacked, it would immediately close the Strait of Hormuz, a strategic chokepoint nestled between the Gulf of Oman and the Persian Gulf (*Al-Siyasa* [Kuwait], July 7). Iran's Revolutionary Guard Corps Commander Mohammad Ali Jafari warned, in no uncertain terms, that "one of our reactions will be to take control of the Persian Gulf and the Strait of Hormuz." Major General Jafari added that Iran's "capabilities in these crucial naval passages are so extensive that, in the case of an attack, not only the enemy but also all those who assist him will no doubt sustain [considerable] harm. [...] As a result of taking control of the Strait of Hormuz, the price of oil will spike considerably" (*Jam-e Jam* [Tehran], June 28). More recently he said that the Strait is within the range of Iran's weapons and could easily be blocked for an unlimited period of time (*Kayhan* [Tehran], August 5; IRNA, August 4; BBC, August 4). Iran's armed forces Chief of Staff Hassan Firouzabadi insisted that "if the country's interests are jeopardized [...] we will not let a single vessel pass through the Strait" (IRNA, July 5). Expressing alarm, some Persian Gulf governments led by Qatar have launched a series of consultations in anticipation of the blocking of the Strait and in order to guarantee the continuation of oil export (for which emergency plans had already been drafted) (*Al-Jarida* [Kuwait], July 1). A Saudi editorial headlined "Closing Hormuz: Iranian Suicide" warned that blocking the Strait would not only upset the United States but would turn the entire world into a united front against Iran (*Al-Watan* [Riyadh], August 5).

Hormuz is by no means a new vista for China. It had been mentioned in Yuan Dynasty sources and visited by Admiral Zheng He's naval expedition in 1412-13 and 1430-31. At least four Hormuz diplomatic missions came to China [1]. The History of the Ming Dynasty (*Mingshi*, Ch. 326) says: "The country of Hulumusi [Hormuz] is situated on the utmost border of the Western Sea. The trading vessels of the southern barbarians come thither, and the nations of the Great Western Sea, as well as the merchants of the *Xiyu* [Western Asia] meet for commercial purposes." Today's China is one of them. Heavily dependent on Persian Gulf crude oil imports and maintaining friendly relations with all parties involved, Beijing, however, has not yet officially responded to Tehran's threats [2], though undoubtedly it has been making its own preparations.

Following the U.S.-Iran naval incident in the Hormuz Strait earlier in the year, Hua Liming, former Chinese ambassador to Iran, told *China Daily*: "Neither Washington nor Tehran seems to have a political will strong enough for a military showdown in the Persian Gulf in the near term" (*China Daily*, January 10). This issue was not raised publicly during Mahmoud Ahmadinejad's recent meeting with Hu Jintao while on a one-day visit to China on September 6. This was their third meeting, Ahmadinejad's second visit to China and first to Beijing. The Iranian president's stay was cut short by half and a scheduled press conference was cancelled—no reason was given (AFP, September 6). Using very general terms, Hu Jintao said that the two countries "would strengthen international cooperation and jointly safeguard regional and world peace and stability" (Xinhua News Agency, September 6). Before his departure Ahmadinejad said in a reserved tone that "good decisions" had been made; that the prospects of economic relations are "good"; and that bilateral relations have been "satisfactory" (IRNA, September 7). Beijing did not demonstrate much enthusiasm about Ahmadinejad's reelection, has endorsed UN Security Council sanctions against Iran and failed to support Iran's admission to the Shanghai Cooperation Organization (SCO)—all this despite China's "dependence" on Iran's oil.

Growing Dependence Yet Relatively Limited

China's oil imports vary considerably not only from year to year but also from month to month. Yet the overall trend is clear: the Persian Gulf is a major source of Chinese crude oil and in the long run China will likely become even more dependent on this region for its energy needs than it is today. The reason is that while Beijing has been attempting—albeit unsuccessfully—to diversify its external oil resources that now spread all over the world, many of these resources are forecasted to dwindle and dry up within the next two to three decades, while the same cannot be said of the supply in the Persian Gulf. According to most recent estimates, oil reserves of the Persian Gulf countries account for nearly 56 percent of the world's total and, at current output levels, assure continuous supply for 80 to 110 years [3]. In May 2008 nearly 30 percent of the world's total crude oil was produced behind the Hormuz Strait. The main producers were Saudi Arabia (with 9.4 million barrels per day [bpd)] or 12.62 percent); Iran (4 million bpd, 5.38 percent); the United Arab Emirates (2.7 million bpd, 3.64 percent); Kuwait (2.6 million bpd, 3.5 percent); Iraq (2.5 million bpd, 3.3 percent and Qatar (938,000 bpd, 1.26 percent) [4]. Some of this oil goes to China.

China's oil imports have been growing steadily, well above GDP growth. In the first quarter of 2008 China imported 44.95 million tons of crude oil, up 14.9 percent over the same period last year, while GDP growth lagged behind with "only" 10.6 percent (Xinhua News Agency, April 29). In 2007 China's crude oil imports rose 12.4 percent compared to 2006 (Xinhua News Agency, January 12). At present, around one-third of China's oil imports flow through the Hormuz Strait. In the first half of 2008 (January-June), 29.75 percent of China's oil import came from Saudi Arabia (656,000 bpd, 17.92 percent) and Iran (433,000 bpd, 11.83 percent) [5]. Much smaller amounts came from other Persian Gulf countries.

When weighed against the rapid expansion of China's international economic relations, the share of the Persian Gulf in China's foreign trade is quite modest, though steadily increasing: in 2006 it reached a little over three percent of China's trade turnover, or nearly four percent of its total imports, mostly crude oil (*China Statistical yearbook 2007*, p. 730). Much more heavily dependent on Persian Gulf oil, other Asian countries such as Japan, Taiwan, South Korea, India and Singapore obtain a much higher share of their oil through the Hormuz Strait. In fact, most of the oil traffic in the Strait (about two thirds) is directed at Asia. Of about 17 million bpd shipped through the Hormuz Strait, 16 percent goes to Europe, 11 percent to the United States and 66 percent to Asia. China is by no means the most important customer. In 2007 Japan accounted for 17.7 percent of Saudi Arabia's export, the Republic of Korea for 9.1 percent and China for only 7.2 percent. Taiwan and Singapore accounted for 4.7 percent and 4.5 percent respectively (EIA, *World Oil Transit Chokepoints*, January 2008). Put differently, the share of Japan in Saudi trade, and consequently its vulnerability to trade disruptions, is nearly 2.5 times greater than China's. In July 2008 Japan imported 90.3 percent of its oil from the Middle East, of which 82.6 percent from suppliers that use the Hormuz Strait—31.03 percent from Saudi Arabia, 30.96 percent from the UAE, 15.89 percent from Qatar, 14.33 percent from Iran and 7.79 percent from Kuwait (Qatar News Agency, August 30).

China's Iran Connection: Oil and Arms

China's limited reliance on Persian Gulf oil relative to the other Asian economies in spite of the region's strategic significance, as well to its overall international economic relations, is but one reason for Beijing's reluctance to flag the Hormuz Strait as an issue. Other reasons include the fact that China does not want to jeopardize its economic benefits and political advantages. In addition, and despite Iran's threat to prolong the conflict, according to analysts Iran's capability to cork the Hormuz bottleneck is limited and expected to be relatively short: "Iran could not 'close the Gulf' for more than a few days to two weeks" [6]. China, hypothetically, could withstand such an interruption, given the buildup of its four strategic oil reserves that are expected to become operational by the end of this year. With a total capacity of 16.4 million cubic meters (or around 100 million barrels) they could substitute for three months Persian Gulf oil supply to China—or about one month of total supply (*China Daily*, August 19). Finally, the Chinese undoubtedly prefer to conceal the fact that some of the weapons that Iran and its Revolutionary Guards deploy along the Hormuz Strait, and that are planned to be used for enforcing its closure, are either made in China or based on Chinese technology sold to Iran.

Estimated at $4.483 billion—or 31.7 percent of the total—from 1979 to 2007, China's arms sales to Iran are second only, and very close, to the Soviet Union and Russia that have provided Iran with $4.967 billion of weapons—or 35.1 percent of the total [7]. These exported Chinese arms include the following anti-ship cruise missiles and technologies for license production: C-801/CSS-N-4 (YJ-8, Sardine, Iran's derivation: Kosar); C-802/CSS-N-8 (Saccade, Iran's derivation: Noor); TL-10/FL-8 (TL-10A and possibly TL-10B version); TL-6/FL-9 and C-701 (YJ-7) [8]. With a range of between 40 and 120 kilometers these weapons could cover the entire area of the Hormuz Strait.

China had begun to supply Iran with anti-ship missile in the mid 1980s, during the Iran-Iraq War. Consequently, HY-2 missiles (also known as Silkworm, Iran's derivation: Raad) were deployed at Larak Island and at Kuhestak, covering the narrow bend of the Hormuz Strait. It is estimated that about ten HY-2s were fired by Iran before a ceasefire was enforced on August 20, 1988. Still, most of them were fired at Kuwait (from the Fau Peninsula seized from Iraq)—rather than at the Strait—hitting Kuwait's Sea Island offshore supertanker export oil terminal as well as two U.S.-owned oil tankers (*New York Times*, October 23, 1987). Another HY-2 was fired in early December bringing the number of Iranian-fired HY-2s to seven in 1987 (*New York Times*, December 8, 1987). Since then Iran has deployed along the Strait a number of more advanced anti-ship missile batteries, either Chinese or license-produced using Chinese technologies (e.g. HY-2/CSS-C-3/Sea Eagle (Seersucker) and C-802 on Qeshm Island that dominates the Strait) [9].

Some of these missiles are installed on Chinese-made fast missile boats, notably type *Houdong*, of which Iran received 10 to 15 and, according to some sources, about 40 [10]. Iran was also the first customer of at least five C-14 China Cat Class fast attack missile craft, each equipped with up to eight C-701 anti-ship cruise missiles (http://www.globalsecurity.org). In addition, over 11 French-designed missile patrol boats are equipped with two to four Chinese-made CSS-N-4/YJ-1 C-801 anti-ship missiles [11]. However, while most attention is focused on Iran's Chinese-made missiles and missile boats, an equally significant Chinese-made weapon that is specifically relevant to a possible closure of the Strait of Hormuz should by no means be overlooked. In the 1990s Iran purchased from China sophisticated EM-52 and EM-53 bottom-tethered mines. Their rocket-propelled 300-kg warhead is capable of hitting the hull of its target vessel at speeds in excess of 80 meters per second. They "are thought to be deactivated by coded acoustic signals to allow the safe passage of friendly vessels, and again activated to prevent the transit of those of an enemy" [12]. So unless Tehran provides Beijing with the codes (which is inconceivable), incoming or outgoing Chinese shipping in the Strait could be hit—perhaps by Chinese-made weapons. Given its indirect presence in the Gulf, how would Beijing behave in case of a confrontation in the Hormuz Strait?

Escape from Predicament

It is highly unlikely that Chinese would intervene in such a confrontation. Following its time-honored behavior, Beijing would likely avoid any involvement, calling to settle the conflict peacefully by diplomatic means. In case of escalation, either before or after the Strait is blocked, China would fail to use its veto power and Tehran knows it (*China Brief*, September 6, 2006). Iranian editorials and commentaries occasionally warned the government not to trust Beijing (and Moscow). An article in the Iranian press questioned China's (as well as Russia's) decision to veto UN Security Council sanctions on Zimbabwe but approve sanctions on Iran (*Jomhuri-ye Eslami*, July 13). While the Chinese do not likely intend to actively protect their assets in the Gulf in case of a crisis, they have undoubtedly made preparations to minimize the damage.

As mentioned above, although the Chinese are heavily dependent on Persian Gulf oil, they are less vulnerable than other Asian countries as China still provides about half of its oil needs and sources for the other half are distributed all over the world Aware of Iran's risky situation, in early 2006 Beijing basically accepted Saudi Arabia's offer to supply China with whatever oil it needs in case of sanctions or use of force against Iran. Yet, if the Strait of Hormuz is blocked by Iran, no Saudi oil could flow to China either. Possible alternatives for Beijing are to increase oil imports from Oman and Yemen, though this could be no more than a stopgap solution as their oil export capabilities are substantially smaller. Compared to Saudi Arabia's crude oil reserves, estimated at nearly 267 billion barrels, Oman's reserves are estimated at 5.5 billion and Yemen's at 3.3. While Saudi Arabia's share in the world's total oil production in 2007 stood at over 12 percent, Oman's share was 0.85 percent and Yemen's 0.38 [13]. Another alternative is to ship Saudi oil through the 745-mile long Petroline (or East-West Pipeline) crossing from Abqaiq to the Red Sea terminal at Yanbu. This would not only add four to five day travel eastward, not to mention its smaller capacity, but would also force oil transportation to pass through Bab al-Mandab, another risky choke point that could be blocked, possibly by terrorists.

Finally, in early 2007 the China Petroleum Engineering and Construction Corporation (CPECC) signed an agreement with Abu Dhabi's International Petroleum Investment Company to build a pipeline that would bypass the Strait of Hormuz. The project involves the construction of a 360-km, 48-inch diameter pipeline with a capacity of 1.5 million bpd of crude oil from Habshan west of the Strait to al-Fujayrah east of the Strait, crossing the UAE and Abu Dhabi (Arabianbusiness.com, January 30, 2007). Construction work started in March 2008 and the project is expected to be completed in March 2010 [14]. Still, when completed, it will be a drop in a bucket compared to the 17 million bpd of crude oil that pass the Hormuz Strait today.

In sum, it is in Beijing's interest that closure of the Hormuz Strait (and much more so an overall confrontation) should be avoided and prevented at all costs— preferably by satisfying Tehran's claims and demands by political and diplomatic means so as to ensure stability. Yet, if a confrontation could not be avoided, its effects on China would be relatively limited. Still, it is in Beijing's interest that the conflict would be as brief as possible and as soon as possible. A brief and early conflict means less disruption while China is less dependent on the Persian Gulf. A longer and a later conflict means greater disruption and instability while China would become much more dependent on Persian Gulf oil—and on U.S. protection.

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Notes

1. Ma Huan, *The Overall Survey of the Ocean's Shores* (*Yingyai shenglan*, 1433), tr. by J.V.G. Mills (Halikut Society, 1970), pp. 165-172.
2. The Chinese are, of course, aware of the problem. See "The Persian Gulf Bottleneck" (Bosihai pingjing) in: Wu Lei, *China's Oil Security* (*Zhongguo Shiyou Anquan*), Beijing, 2003, pp. 152-158.
3. EIA, "International Oil Reserves", updated August 27, 2008.
4. Http://netoilexports.blogspot.com; EIA, *Persian Gulf Region* (June 2007).
5. *China Custom Statistics* quoted by: Walid Khadduri, "China's Oil Consumption Increased despite Price Hikes," *Al-Hayat*, July 29, 2008.
6. Anthony H. Cordesman, "Iran, Oil, and the Strait of Hormuz," CSIS (Washington: Center for Strategic Studies, March 26, 2007), p. 6.
7. SIPRI: http://armstrade.sipri.org/arms_trade/values.php, updated September 1, 2008.
8. "China's Missile Exports and Assistance to Iran," http://www.nti.org/db/china/miranpos.htm.
9. Bates Gill, "Chinese Arms Exports to Iran," MERIA, *Middle East Review of International Affairs*, Vol. 2, No. 2 (May 1998), pp. 5-6.
10. Http://www.globalsecurity.org/military/world/iran/hudong.htm.
11. Cordesman, op. cit, p. 5
12. Andrew Erickson, Lyle Goldstein and William Murray, "China's Undersea Sentries," *Undersea Warfare*, Vol. 9, No. 2 (Winter 2007); http://www.navy.mil/navydata/cno/n87/usw/issue_33/china.html.
13. EIA, "International Oil Reserves", updated August 27, 2008.
14. Http://www.zawya.com/projects/project.cfm/pid211106110219?cc.

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Is a Commercial Corporate Bond Market in China Finally Emerging?

By Pieter Bottelier

The transfer of responsibility for the approval of medium- and long-term corporate bond issues by listed companies from NDRC (National Development and Reform Commission) to CSRC (China Securities Regulatory Commission) may turn out to be a watershed decision in China's transition to a more market-oriented economy. The involvement of CSRC in corporate bond issues since the new rules were issued in August 2007 (Business Week, August 8, 2007) is a natural sequel to the establishment of a market for short-term corporate bonds (one year maturity or less) under the auspices of China's central bank (PBC) in May 2005. Depending on how this institutional change is followed through in practice, it marks a potentially important relaxation of state control over the economy. There is now a chance that a commercial corporate bond market will finally emerge in China. This is a high priority for the reform and development of China's financial system since the move would reduce corporate dependence on bank loans, stimulate capital market development and serve the need of institutional investors for debt instruments with a wider range of maturities and risk profiles [1]. Most Chinese bonds are issued by the government and government-owned banks and the corporate bond market provides only 1.4 percent of the total financial needs of corporations in China [2]. Early indications are promising: during the first half of 2008, 21 listed firms raised about $10.9 billion (RMB 74.5 billion) from non-guaranteed corporate bonds authorized by CSRC, more than the amount raised by all listed companies in the stock market during the same period (*China Daily*, August 1). The development of a commercial corporate bond market would improve the efficiency of China's financial system by reducing the capital bottlenecks that pervade the system.

There are indicators that suggest the government has selected the Tianjin Binhai New Area in the northeast as the next hub for concentrated development and for trying out new ideas for financial reform that could, if successful, be replicated elsewhere in the country. Tianjin could become the next Shenzhen or Pudong. The Tianjin Binhai New Area, which consists of three administrative districts (Tanggu, Hangu and Dagang) and eight industrial zones currently under construction, offers an excellent opportunity to accelerate capital market development in China. Earlier ideas for the development of Tianjin as a financial center, namely to make the RMB freely convertible in the Binhai New Area and to make Bank of China's Tianjin branch the gateway for direct and unlimited household investments on the Hong Kong stock exchange were grounded just as soon as the idea took off. However, global financial volatility has breathed new life in China's financial reforms.

Recently Vice-Premier Li Keqiang, while inspecting the port city, stated that local officials should accelerate efforts to develop the Binhai New Area into "a northern portal of the country's reform and opening up drive, a base of modern manufacturing and scientific research and application, and an international shipping and logistics