

ISSN 1226-4490

*International
Journal of
Central
Asian Studies*

Volume 12 2008

**Editor in Chief
Choi Han-Woo**

**The International Association of Central Asian Studies
Korea University of International Studies**

The Coming Era of the Multinational Emerge together: EU, USA, Russia, India and China join the International Energy Race in the New Energy Silk Road

Chen Te Fu

Ching Yun University, Taiwan

Abstract

A crisis mentality is starting to pervade not only oil markets but also natural gas markets. Analysts are starting to think the unthinkable: that a potential supply shortage is keeping prices high and that, over the coming two or three years, the world might be heading towards its third oil crisis. The traditions of trade along the Silk Road may be reprised as India and China look to the Middle East for their energy needs. The new relationship the Middle East has with China and India has led to the rebirth of the Silk Road analogy: Chinese silk and Indian spices have been replaced by modern energy investment into the Gulf. Commentators are forecasting that this century will belong to Asia, with China and India at the forefront. The Middle East has started to prioritise energy supply towards Asia and away from the traditional western markets. This coincides with Asia's surging demand for oil, as well as a need to ease carbon emissions resulting from dependence on coal.

Chinese companies have sought to establish a presence mostly in countries where US and European companies are absent. The dramatic political situations between China and some countries play an important role in the China's energy strategy. Geographically they really should make cooperation; they are both against "American hegemony", they have commendably ameliorated their relationship since years; above all these, the most important are that, Russia is a big provider of energy and China is a big customer. They're the ideal energy suppliers for China.

Middle Eastern oil producers share significant commercial and strategic interests with China; with the rupture of the relationship between USA and the Middle East, and the dramatic improvements between Beijing and Riyadh, China has secured and developed this side of its suppliers.

In Central Asia, particularly in Kazakhstan with its multifaceted foreign policy, the EU faces new challenges. Kazakhstan's close relationship with China is a fait accompli which has to be accepted if possibilities of altering it are not at hand. However Kazakhstan's incessant attempts to diversify its energy transportation routes in order to minimize its dependency on Russian pipelines are an encouraging development for the EU's energy strategy in Central Asia. The main demand for energy in the twenty-first century will come from the East. Geographically much closer to Russian and Central Asian energy reserves than is the United States, the rising Asian countries will have a strong stake in establishing a deep political foothold in and around the Caspian Sea. The ancient Silk Road between Iran and China will likely become an energy road.

1. The future of Central Asia

Why we should attach so much importance to the future of Central Asia. Hunter (1996)¹ discusses the energy deposits of the region and the various possible routes for transporting Central Asian oil and gas to international markets via pipeline, but does not mention the extent of Central Asia's oil and gas riches. Nor does she provide compelling reasons for the region's political significance. The fate of Central Asia in the twenty-first century will bear directly on the global balance of power, not just because of the region's vast energy reserves -- considered second only to the Persian Gulf -- but also because Central Asia geographically connects China, Russia and Iran, three countries destined to remain central U.S. foreign policy concerns in the decades ahead.

¹Shireen Hunter, "Central Asia Since Independence", published by Center for Strategic and International Studies, CSIS, New Brunswick, New Jersey. 1996

Any attempt by Beijing, Moscow and Tehran to forge stronger economic and strategic ties in the future will have to be anchored in their cooperation in Central Asia. If we give Huntington's thesis on the clash of civilizations any credence, as the millennial crossroads of Confucian, Slavic, and Irano-Islamic civilizations, Central Asia will have to be seen as a region of immense strategic significance. The main demand for energy in the twenty-first century will come from the East. Geographically much closer to Russian and Central Asian energy reserves than is the United States, the rising Asian countries will have a strong stake in establishing a deep political foothold in and around the Caspian Sea. The ancient Silk Road between Iran and China will likely become an energy road. The successful projection of American power in this region, then, will have to be a cornerstone of US foreign policy. Failure on this front could spell the beginning of the decline of the United States as the preeminent global power in the next century. (Alidad Mafinezam, 1996)²

2. A Third Oil Crisis?

Oil is back. Since March 1999, the buoyancy of global oil prices has alarmed governments and baffled analysts. A crisis mentality is starting to pervade not only oil markets but also natural gas markets. The US Department of Energy suggested in early 2001 that the United States is facing its most serious energy shortages since the 1970s. Analysts are starting to think the unthinkable: that a potential supply shortage is keeping prices high and that, over the coming two or three years, the world might be heading towards its third oil crisis. Oil has a tendency to confound expectations. However, unlike the 1973 and 1979 oil crises, any future third oil crisis is likely to have relatively less impact on the

²lidad Mafinezam, A review of Shireen Hunter's "Central Asia Since Independence", published by Center for Strategic and International Studies, CSIS, New Brunswick, New Jersey. 1996

global economy - unless the oil price rose to [dollar] 50 per barrel, an unsustainable prospect in the long-term. (Mamdouh G. Salameh, 2001)³

In 1973 an Arab embargo sent oil prices soaring, and a global recession followed. In 1979 the Iranian revolution provoked a second surge in oil prices, and another global recession. Are we now at risk of a third oil crisis? I wish I could say no, but I can't. Oil prices have raised about \$10 per barrel since the situation in the Middle East began deteriorating. So even if they stay where they are, this represents a serious shock to the system -- and there could be more to come. True, political analysts assure us that despite Iraq's decision to stop oil exports for a month, no broader, 1973-style oil embargo is likely. Let's hope they're right. But the 1979 oil crisis wasn't the result of a deliberate embargo.

Economists have never reached a consensus about what happened in 1979, but my interpretation is that it was similar to the recent California electricity crisis. In both cases the key was the combination of a tight market and demand that wasn't very responsive to price. Under those circumstances, individual producers -- power companies in California, oil-producing countries in 1979 -- have a lot of market power. That is, it is in each producer's interest to cut back production to drive prices higher. The result is a price surge, even though there is no real capacity shortage.

Are world oil markets that tight? Not yet -- the world still has about seven million barrels' worth of spare capacity each day. So Iraq, by taking away its two million barrels a day, cannot create a crisis by itself. But the remaining slack in the system is just about equal to the combined production of Iran and Libya, which have also proposed an embargo. The point is that it would not take much worsening in the political situation to produce markets so tight that the logic of market power kicks in and countries decide that, quite aside from politics, their financial interest lies in reducing, not increasing, their output.

If an oil crisis can happen so easily, why haven't we had one since 1979? The answer is that we made ourselves crisis-proof for a while, then became complacent. After the oil crises of the 1970's, Western

³ Mamdouh G. Salameh, Oil Market Consultancy Service, Spring Croft, Sturt Avenue, Haslemere, Surrey GU27 3SJ, UK. Available online 24 January 2000.

economies sharply increased their energy efficiency: the U.S. economy was a third bigger in 1985 than it was in 1973, but it consumed less oil. The result was the marginalization of the danger zone: in 1985, the Persian Gulf produced only 18 percent of the world's oil, less than half of its share in 1973. But rapidly growing oil consumption in the S.U.V. (Sport Utility Vehicles) era was met, inevitably, by increased Persian Gulf production. So oil prices are once again hostage to Middle Eastern politics.

If oil prices do surge, will this have the same disastrous effects as the price spike in 1979? No, but it may have different disastrous effects. In 1979 the clear and present danger from soaring oil prices was that they would send already inflation-prone Western economies into an out-of-control inflationary spiral. To fight that, all the leading economies raised interest rates -- which controlled inflation, but also generated a nasty recession. Today, after a decade of price stability, fears of inflation are much more muted. Instead, the main concern is the drag of oil prices on purchasing power. Each \$10-per-barrel increase in the price of oil is like a \$70 billion tax increase, one that falls most heavily on middle -and lower-income families.

And this is not a good time to slash purchasing power. Business investment, which plunged last year, has still not recovered; optimistic economic forecasts depend on the assumption that buoyant consumer spending will keep the economy afloat until businesses do decide to invest again. If consumers are made poorer by higher oil prices and cut back instead, that assumption goes out the window. And the Fed can't respond with another big round of interest rate cuts: since it has already reduced rates from 6.5 to 1.75 percent, it doesn't have much ammunition left. So I'm sorry to say that under current conditions, a third oil crisis could indeed happen. It doesn't have to happen: a diplomatic breakthrough could calm oil markets, and even if oil prices rise, the U.S. economy may be more robust than I fear. But it's easier to tell a downbeat, even scary, story than any of us would like. (Paul Krugman, 2002)⁴

⁴ Paul Krugman, The Third Oil Crisis? The New York Times, Published: April 9, 2002

3. Global oil outlook

As we approach the end of the 20th century, the global oil picture starts to look more like the early 1970s, which set the scene for the first oil crisis in 1973. The “security margin” — the gap between demand and production capacity, has been shrinking since the early 1990s. In 1985 OPEC was producing at only 55% of capacity. By 1997 capacity utilization had risen to 95% and, barring the full re-entry of Iraq into the oil market, capacity utilization in 1998 is projected to rise to 96% with a growth of more than 1.6 million barrels a day (mbd) in global demand. No wonder, then, that the “capacity question” has been termed “oil's perennial problem”. The dilemma confronting producers is either they face the danger of over investing if demand grows slowly or not at all, or they run the risk of investing too little, too late. Yet, without outright investment, the capacity constraint may start to bite at some point in the near future. This paper will endeavour to analyse the origins of the shrinking “security margin” and its impact on the global oil supplies, the price of oil and the global economy. It will argue that under such conditions, one has to seriously consider the possibility of a third oil crisis capable of again disrupting the global economy, triggered again by political upheaval in the Middle East. (Mamdouh G. Salameh, 2000)

4. Russia and the Emerging Security Dilemma in Central Asia

This paper makes two related claims. First, current debates about the nature of American primacy largely neglect how weak states can nonetheless frustrate American designs even under conditions of sharp material asymmetry. Second, these debates also sidestep the question of why states vary in their degree of sensitivity to American strategies. The study argues that we need to view the security dilemma as a social process if we are to capture how actor identities and interests can become more conflictual over time. The content of a regime's legitimating identity project, coupled with its prior rhetoric, determine (1) its sensitivity to American policies and (2) its probability of becoming entrapped on a path that leads to escalating challenges of American primacy. Russia's response to the introduction and use of American

forces in Central Asia after 11 September 2001 is used to test the proposition that security dilemmas can shift actor identities and create incentives to challenge, if quietly, American power. (Lyall, Jason, 2004)⁵

4.1 Russia's Central Asia energy strategy experiences a few setbacks

Russia has suffered several setbacks in its ongoing efforts to secure its energy dominance in Central Asia. Both Uzbek and Tajik officials have taken steps of late to reduce Russia's energy position in their respective countries. Under a surprise deal signed late in April, Uzbekistan announced its intention to build a 530-kilometer natural gas pipeline to China. The route would have a capacity of 30 billion cubic meters (bcm) a year, an amount constituting roughly half of the Central Asian state's annual gas production. If implemented, Uzbekistan would stoke energy competition between Russia and China, and presumably would secure for itself higher profits, as well as a greater degree of political leeway. Uzbekistan is world's 13th largest natural-gas producer and the third largest producer among former Soviet states after Russia and Turkmenistan. The key Chinese partner in the new pipeline project is the China National Petroleum Corp (CNPC).

A statement announcing the pipeline plan was released on April 30, signed by Ma Kai, the director of China's National Development and Reform Commission, and Uzbek Deputy Prime Minister Rustam Azimov. The statement did not provide details of the project, offering no information on costs, construction timeframe or the precise route. Uzbekistan does not share a border with China, and it's unclear which of the three possibilities -- Kazakhstan, Kyrgyzstan or even Tajikistan? would be used as a transit country. Kazakhstan seems the likeliest bet, as it already has a pipeline connection to China's "West-East" network, which supplies coastal regions via Xinjiang Province. Astana also appears eager to cast itself as a gateway for the export of Central Asian

⁵ Lyall, Jason, "Great Games: Russia and the Emerging Security Dilemma in Central Asia", the annual meeting of the American Political Science Association, Hilton Chicago and the Palmer House Hilton, Chicago, IL, Sep 02, 2004.

energy to China. On May 2, for example, Kazakh Prime Minister Karim Masimov discussed a pipeline extension with Turkmen leader Kurbanguly Berdymukhammedov during talks in Ashgabat. According to a Chinese-Turkmen pact, Ashgabat is expected to begin exporting gas to China by 2009. (BUSINESS & ECONOMICS, 2007)⁶

If implemented, the Uzbek-Chinese pipeline would undermine Russia's ability to manipulate Central Asia's gas market. Uzbek authorities moved quickly to strengthen economic and political ties in the months following the 2005 Andijan massacre. But recently, Tashkent seems to have soured on the idea of a special relationship with Moscow. A sign of an Uzbek shift came in 2006, when officials in Tashkent threatened to revoke an exploration license granted to the Russian conglomerate Gazprom, accusing the company of failing to fulfill investment commitments. Gazprom officials blamed the delay on the failure of Uzbek authorities to issue proper permits. Russian Prime Minister Mikhail Fradkov's visit to Tashkent last March reportedly failed to resolve the Gazprom issue.

Gazprom bought 9 bcm of gas from Uzbekistan in 2006, and convinced the Uzbek government to sell it 13 bcm in 2007. It has unsuccessfully tried for years to get Uzbekistan to boost its annual supplies to 17-18 bcm, although in 2006 Gazprom agreed to pay \$100 per thousand cubic meters (TCM), up \$60 per tcm. Chinese companies also have encountered trouble in the Uzbek energy market. Earlier in April, China's state-run Sinopec reportedly withdrew from an oil & gas joint venture with Uzbekneftegas - because of high oil-extraction tax rates. After the signing, the project remained stalled. In 2005, Tashkent increased taxes from 12.3 percent for crude oil and 18.5 percent for natural gas to 32 percent and 58 percent respectively. Although the rates subsequently dropped to 20 percent and 30 percent respectively in 2007, they are still seen as prohibitively high. A potential obstacle to the realization of Tashkent's pipeline plan is connected with Uzbekistan's gas production capabilities. Uzbekistan's total annual production stands at about 60 bcm, and much of it are used for domestic consumption. In

⁶ BUSINESS & ECONOMICS, Russia's Central Asia energy strategy experiences a few setbacks, Posted May 11, 2007, Eurasianet, <http://www.eurasianet.org/>

2006, Uzbekistan produced 62 bcm, but exported just a little over 12 bcm, including the 9 bcm purchased by Gazprom. The remainder went to neighboring states Kazakhstan, Kyrgyzstan and Tajikistan.

Active exploration is underway in the Aral Sea region, but no major new findings have been announced recently. According to a report distributed by the Press-Uz.Info news agency, citing a presidential decree, a CNCP affiliate will supply Uzbekneftegas with over \$209 million in drilling equipment. Of the total, \$177.6 million will be covered by a 15-year loan by China's Eximbank, and Uzbekneftegas will be responsible for only \$31.5 million in financing. Meanwhile, Russian-Tajik tension revolves around hydropower. On April 26, Tajik officials announced the collapse of a \$1-billion deal, under which the Russian aluminum concern OAO Rusal was to have built a hydropower plant, known as the Rogun Dam. Rusal is also embroiled in a dispute with Tajik officials over efforts to modernize a massive aluminum plant in Tursunzade, not far from the Uzbek border.

Tajik authorities' displeasure is rooted in suspicion that Uzbek political pressure prompted Rusal to scale back plans for Rogun construction and aluminum plant modernization. Both projects, if completed, would greatly enhance Tajikistan's political leverage in its dealings with Uzbekistan. Uzbek authorities say an expansion of the Tajik facility would cause severe environmental harm to Uzbekistan. With Tajikistan evidently souring on the prospects of cooperation with Russia, Dushanbe appears ready to turn to Iran for help. The topic of Iranian assistance for the Tursunzade plant came up during talks between Tajik officials and visiting Iranian Defense Minister Mustafa Mohammad Najjar in late April, the Ferghana.ru website reported. Tajik officials have indicated that any Russian firm, except Rusal, will be able to join an international consortium being assembled to complete the Rogun project. Another Russian state-controlled entity, United Energy Systems, has expressed interest in completing the Rogun hydropower plant. (BUSINESS & ECONOMICS, 2007)

4.2 Russian History Encyclopedia: Central Asia

Central Asia was important to Russia for several reasons. First, it became a core supplier of raw materials. Not only were food and livestock important commodities in the region, but so were exportable industrial products. Minerals, coal, and timber from the northern parts of the region and cotton from the central and southern parts were integrated into the Russian economy. In particular, the shortage of cotton on the international market caused by the U.S. Civil War (1861-1865) prompted Russian officials to expand cotton production in Central Asia for domestic use and for international trade purposes.

Second, Central Asia was strategically important. As noted, Russia found it was competing with Great Britain over South Asian possessions in what was often dubbed “the Great Game”. As Russia expanded its control over the steppes of Kazakhstan and into the settled regions of Turkestan, attention was directed southward. It was not until the negotiated border agreement of 1895 that Russia and Great Britain came to terms with their respective holdings in Asia-Russian territory being what is today “Central Asia”, and British territory being the regions of Pakistan and India. Afghanistan was seen as a “neutral buffer state,” albeit under British influence.

Within the Russian-controlled region of Central Asia, major settlements in the north included the strategic Orenburg, Pavlodar, and Semi-palatinsk. Further south, the cities of Vernyy, Pishpek, and Tashkent were critical. Some of these cities, such as Tashkent, Bukhara, Samarkand, and Khiva, were ancient cities with large indigenous populations. Others were Russian - dominated settlements. Railway lines connected all of these cities by the early twentieth century, making it easier for Russians to travel through the region.

Throughout the Soviet period, Central Asia remained a source of raw materials. With the collapse of the Soviet Union in 1991, the independent states of Central Asia have remained important to Russia. For much of the 1990s, indeed, Russian leaders considered it part of their “Near Abroad”. Even in the early twenty-first century, there is a sense that Central Asia is part of the Russian national security interest region. Trade relations, although decreasing since the Soviet era, remain

significant. Energy transfer routes often pass through Russia and many communication links are still northward. There is also a cultural link that is somewhat important to Russia. Several million Russians continue to live in Central Asia, particularly in Kazakhstan and the Kyrgyz Republic. While this was often deemed a source of potential conflict, it is more the case that Russians living in Central Asia will become less attached to Russia proper as time passes.

Ultimately, Central Asia remains important to Russia, but in a limited way. Central Asian countries (Figure 1) have increased their ties to other countries, such as China, Turkey, and the United States. In addition, as energy exports from Central Asia increase, Russia will find itself sharing influence in the region. (answers.com)⁷

5. China's Current Energy Strategy and Oil Diplomacy towards Russia and Central Asia

China rising recently becomes the focal point of global discussions, and many people discuss this phenomenon from different angles. This article supposes Chinese economy continues steady progression, and that subsequently causes the promotion of Chinese comprehensive national strength. It also discusses the root and reasons of steady progression of Chinese economy, and argues that will these factors achieve the goal of China rising? Moreover, regardless of how fast development of Chinese economy in the future, China must lean on sufficient and stable energy supplies, that will support the sustained development of its economy. At the beginning of 1990s China already became the crude oil importing country. Along with the fast development of Chinese economy, China starts to purchase the crude oil positively in the international market. Although the crude oil is free sale's commodity in the international market, but its attribute also belongs to the strategic resources. China ambitiously obtains the crude oil in the international market in the diverse ways, not to be restricted in the sole region to purchase it. In order to achieve the goal China rising, i.e. the stable growth of its

⁷ answers.com, Russian History Encyclopedia: Central Asia,
www.answers.com/topic/central-asia

economy in the present stage, the Chinese diplomacy also serves for this general goal. China positively cooperates with the global oil-producing countries, and the high-ranked leaders also often visit the energy-abundance countries. China pursues to obtain the sufficient energy, but most importantly the energy can be transported to China safely. China has insufficient power now to guarantee security of crude oil transported to homeland in any occasion, but it seems not to be a problem among China, Russia and Central Asia countries' cooperation in the field of energy. These countries share the common boundaries, Russia and Central Asia countries may transport directly the crude oil to China through the boundaries by way of the oil tubes. This way of transportation may guarantee the stable energy supply from Chinese side, and also promotes its security largely by land transportation. Comparing with the energy obtained by China by the marine transportation, the factor of security is the sole characteristic among China, Russia and Central Asia countries cooperation in the field of energy. (Hongyi Lien, 2008)⁸

6. China--Building New Silk Roads to Avert an Energy Crisis in 2010

China embarked upon its remarkable GDP growth under the leadership of Deng Xiaoping, Mao's successor. Deng's message to his comrades: "To get rich is glorious." China responded by creating a middle class which is now nearly the same size as the entire population of North America. By meeting the country's energy demands to feed such rapid growth, China has engendered a worldwide race, most notably with neighboring India but also with others, to accumulate sufficient energy sources and raw commodities. Yet on the horizon, China has a serious energy crisis which could reduce its stunning GDP growth.

By the late 1990s, northeastern China's vast Daqing oil fields passed their peak, and no new oil fields of that magnitude were discovered. A net oil exporter until 1993, China's growing appetite for energy sources

⁸ Lien, Hong-Yi, "China's Current Energy Strategy and Oil Diplomacy Towards Russia and Central Asia", the annual meeting of the MPSA Annual National Conference, Palmer House Hotel, Hilton, Chicago, IL, Apr 03, 2008

and other commodities has created what some call a ‘super cycle’ bull market in commodities. Now the world’s second largest oil importer behind the United States, China’s dependence on foreign oil jumped by 10 percent during the first six months of 2006, compared to the same period a year earlier. Oil imports during the first half-year grew to 47.3 percent.

In the context of previous years, the growth of oil imports clearly illustrates China’s astonishing escalation of imported oil. According to the Xinhua news agency, the country’s percentage of imported oil stood, in 2001, at slightly less than 27 percent of total consumption. As of 2004, this percentage had soared above 41 percent (Figure 3). By that year, China was driven to diversify its country-mix of energy sources. The Middle East supplies about 45 percent and Africa exports some 29 percent to China. (James Finch, 2006)⁹

Having about 20 percent of the world’s population, China only consumes four percent of what the world’s oil fields produce. But, a growing middle class will simply consume more petroleum products as the decade comes to a close. Presently importing three million barrels of crude oil every day to fuel the growing number of automobiles, where will China find the oil to produce gasoline in 2020, when the country could have as many as 140 million cars on its roads?

Because of China’s Industrial Revolution, Beijing’s streets, once overflowing with bicycles, are now jammed with nearly three million automobiles. The Chinese middle class want more energy to accompany their new wealth, but where will it come from? Since 2001, China has acquired more than 100 oil fields and companies to sustain its heavy flow of imported oil for this demand. Chinese state-owned oil companies have spent \$15 billion over the past five years to build up their oil reserves.

The country’s state-owned media arm refers to China’s exploration and acquisition expeditions for new oil fields beyond its borders as developing “new silk roads.” (Figure 2) These roads have led to Central

⁹ James Finch, China Races for Energy Security to Keep Pace with GDP Growth--Building New Silk Roads to Avert an Energy Crisis in 2010-part I, August 16, 2006, www.stockinterview.com

Asia, South America and Africa in China's quest to establish more and more energy sources. Is this strategy working fast enough or not? (James Finch, 2006)

6.1 Are China's New Silk Roads Filled with Pot Holes?

China's creation of new silk roads of energy sources has been challenging. Emerging in the mid 1990s as an economic powerhouse to be taken seriously, in the wake of Japan's economic slowdown and the collapse of the Soviet Union, China has all but dictated world commodity prices in a frustrating drive to continue fueling the country's rapid growth. Unfortunately, both Russia's resolve to monopolize energy assets in Central Asia and U.S. political paranoia about China's global ambitions have led to a number of disappointments and setbacks.

Remember China's failed attempt to takeover of UNOCAL¹⁰? Had China National Offshore Oil Corporation (CNOOC) bought UNOCAL, the acquisition would have impaired U.S. economic influence in both Thailand and Burma. Despite this setback, China continued investing heavily in Burma. The Chinese hope to someday export their neighbor's hydroelectric power, by helping the Burmese build a dam across the Salween River.

By acquiring rights to Daewoo's recently discovered offshore oil and natural gas in Burma, China will probably build another pipeline into its country. With each major stride forward, China is frequently pushed back a step. China has grown accustomed to the habit of settling for less in order to meet the country's demand for energy security. Meanwhile, China has been criticized for buying marginally producing oil fields, overpaying for commodities and doing business with unsavory nations.

¹⁰ UNOCAL: Union Oil Company of California, Union Oil Company of California, dba Unocal is a defunct company that was a major petroleum explorer and marketer in the late 19th century, through the 20th century, and into the early 21st century.

6.2 Trouble in Central Asia

In Kazakhstan, China was delayed for seven years in building an 1800-mile oil pipeline across the Kazak border into neighboring Xinjiang province (Figure 4). After China's acquisition of PetroKazakhstan, an oil company whose assets were in Kazakhstan but which was registered in Canada, the Kazak government passed legislation declaring strategic control of the oil assets would be determined by its lawmakers.

China began developing its relationship with the Kazaks in the wake of the Soviet Union's disintegration into several sovereign countries. After an initial meeting with Kazak president Nursultan Nazarbayev, China helped create the Shanghai Cooperative Organization (SCO) in 1996 signing a "mutual trust" agreement with Russia, Kazakhstan, Kyrgyzstan and Tajikistan. Pejoratively known as the Shanghai Five mechanism, the bombastic Nazarbayev called the pact, "the most substantial political move in the Asia-Pacific region of this century."

How long does a handshake with Nazarbayev last? On January 11, 2006, Nazarbayev and Chinese Vice President Zeng Qinghong celebrated the completion of the Sino-Kazakh pipeline, vowing to strategically partner in future energy deals. But before China's Premier Wen Jiabao inked a deal with Australian Prime Minister John Howard to buy Australian uranium in early April, Russia quietly began negotiations with uranium-rich Kazakhstan.

It was evident China would reach for Central Asia's uranium, second only to Australia's known recoverable reserves. In June, three weeks before the G-8 Summit in St. Petersburg, Russia, Kazakhstan's president and Russian President Putin announced a uranium production deal, worth about \$1 billion and lasting through 2020. A month later, on July 25th, the two countries announced a \$10 billion joint venture to build three nuclear reactors in Kazakhstan and a joint venture for further uranium exploration at the Zarechnoye deposit in southern Kazakhstan near Kyrgyzstan and Uzbekistan.

After more than a decade of China's cultivating a relationship with President Nursultan Nazarbayev, Russian President Putin has somewhat undone China's diplomacy for energy security from this country in a matter of months. On January 13th, the Moscow Times reported

Vladimir Putin was rebuilding the nuclear energy ties of the old Soviet states, having first invited the Ukraine and Kazakhstan into the fold. Putin has also built up the Eurasian Economic Community, which is comprised of Russia, Kazakhstan, Uzbekistan, Kyrgyzstan, Belarus and Tajikistan. All are former Soviet states.

The same members also belong to the Collective Security Treaty Organization, of which Uzbekistan's Islam Karimov announced his country would soon join. His country's large natural gas fields are being developed in the western part of the country by Russia's Gazprom to help satisfy European demand. In other words, Russia is slowly edging China out of Central Asia's prolific oil and gas assets. One might expect China's hopes for Kazakh uranium are fairly well dashed.

6.3 China's problem with Russia

With Putin's star rising, Russia has aspired to block China's energy ambitions in Central Asia (Figure 5). When China embarked on a Sino-Kazak strategy, Boris Yeltsin was still president. Since then, Putin and his inner circle of Chekists (named after the Soviet Union's first secret police squads) have begun tightening the noose around the ex-Soviet states. The mandate driving Putin's fellow ex-KGB insiders is Russia's return to superpower status.

This became evident on October 26th 2005, when SCO's top officials met in Moscow for their annual conference. Because India's Foreign Minister and Pakistan's Prime Minister attended as SCO-invited observers, Putin boasted the populations represented by SCO member states and observer countries exceeded three billion people. He bragged he had gathered "half the planet" at the Kremlin. At the top of the SCO agenda were energy issues, such as expanding the oil and gas sector and exploration of new hydrocarbon reserves. Of course, these are the issues which are clearly foremost on the mind of the Chinese.

Chinese Premier Wen Jiabao is determined to avert an energy crisis in this decade. But has Putin's mood swung further toward impudence? When Chinese Prime Minister Wen Jiabao announced the Sino-Russian bilateral trade turnover might surpass \$28 billion, Putin challenged, "I hope this happens." While even Russia's media suspected Putin used the

SCO conference as his egocentric publicity showcase, Russia depends upon China's economic prowess to uplift its own economy. Will there come a time when Russia is less fearful of China's economic might? This might be well into the future. Russia's economy continues to require an ally in China. Politically, Russia depends upon China politically as a buffer from the U.S. The September EU-China Summit to be held in Helsinki should offer clues about the tentative Sino-Russo alliance. Chinese Premier Wen Jiabao will give the keynote address, and possibly helping to forge closer alliances with Russia's neighboring Finland. After all, Nokia is based in Finland, and China is the world's largest consumer of mobile phones and services.

One has to wonder if Russia has been slowly closing China's door to Central Asia over the past few years. Gazprom's press secretary, quoted in a 2004 interview in *Vedomosti*, announced, "... sharing mineral resources with foreign countries is against our policy... In fact, sharing oil with the Chinese would be even more inappropriate." Gazprom, for example, is now developing Uzbekistan's gas fields for export to the West, and not to China. (See part two of this series.)

The delicate equilibrium between Russia and China – one where both countries hope to maneuver against further U.S. meddling (or as cynics call it, imperialism) in the Middle East – requires yielding as few concessions to the other as need be conceded. When China moves too boldly, Russia plays upon its alliance with Japan to keep China in check. Both use their U.N. Security Council vetoes as negotiation tools in carving out petroleum, and other commodity interests, to preserve their energy security issues. China serves Russia's political aspirations in quelling U.S. expansion into the Middle East. Having decades-long ties with Iran and other Muslim states, Russia has a convenient ally in China, when using Iran as a thorn in Washington's backside. And China still remembers the oil concessions it lost in Iraq, after the U.S. invasion of that country. China likely frets about the unending squabble over Iran's uranium enrichment aspirations in light of having lost those Iraqi oil concessions.

6.4 One productive Silk Road leading to China to energy security

At the mercy of a ruthless global energy market, pragmatic China has turned to nations which are shunned by U.S. interests. One productive Silk Road leading to China begins in Iran. More specifically, it starts in the Yadavaran oil fields where the Chinese oil company Sinopec plans to import about 150,000 barrels of crude per day, after it has developed these oil fields. Initially, the October 2004 deal was reportedly valued at \$70 billion. However, additional developments and China's substantial purchase of Iran's vast natural gas reserves may increase the value of this multi-decade energy deal to more than \$200 billion. What could go wrong? Look at the daily headlines: Iran wants to enrich its own uranium. Unless this situation is resolved, escalated political tensions could impair China's ability to import oil and gas. Obviously, China would take great pains to avoid an Iraqi rerun in Iran (Figure 6).

Out-manuevered by western oil companies in obtaining many of the world's proven oil reserves, China has cultivated the Sudan as its largest oil provider. Sudan depends upon the pragmatic Chinese for its economic and military strength. China is also the principal source of hard currency for Africa's largest country. Rejected by the world's community for the genocide it is committing in West Darfur, Sudan exports its oil to China for Chinese weaponry. China finds little competition for Sudanese oil. The Chinese are the largest single shareholders dominating Sudan's oil company consortium. It is the largest investor in a 1,500-kilometer pipeline delivering Sudanese oil to the Red Sea, which is then shipped by tankers to China.

China has not limited its African oil purchases to one country. Another blighted nation, Angola believes it could soon surpass Nigeria as Africa's largest oil supplier (Figure 7). According to the World Bank, China may have recently offered Angola about \$9 billion in credits and loans. Two years ago, it was reported that China extended a \$2-billion loan to Angola for 10,000 barrels of crude oil per day. Now, it appears China is eager to help Angola build sufficient infrastructure in that country to develop another strong energy source.

China is forced to deal with the likes of Venezuelan president Hugo Chavez to protect its future energy security. Hoping to create a Silk Road

across the Pacific from South America, China has continued its hunt for energy security by developing ties with Venezuela's Hugo Chavez (Figure 8). This may come to naught. Venezuela's highly sulfurous crude would first have to be refined in the United States. China lacks the refineries for handling the heavy crude oil. Over the past year, China's oil imports from Venezuela amounted to orimulsion from the Orinoco Tarbelt, mostly used for asphalt.

New refineries, however, can be built to remedy the heavy oil Venezuela might provide. According to a recent special edition of the McKinsey Quarterly, China will be forced to heavily invest in refineries for all the crude oil it has committed for, "To keep up with surging demand, the country needs to build a large, technologically world-class refinery every year for the next 15 years, at a cost of \$2 billion apiece." China lacks the refining capacity to meet its current needs. In the first half of 2006, China's imports of refined petroleum products jumped by nearly 50 percent, compared to the same six-month period in the previous year.

Although Venezuela hopes to become one of China's top three oil suppliers, it is likely more hyperbole than a realistic possibility before 2010. As China's proven oil reserves continue to deplete, it may very well have to turn to Venezuela at some point for this country's vast oil reserves. Outside of the Middle East, Venezuela may have one of the last great oil resource – reportedly at greater than 80 billion barrels of crude. The question is not if, but how fast can, Venezuela accommodate China's ravenous appetite for its country's oil?

Venezuela also has the largest natural gas fields in all of South America. Earlier this year, Brazil and Argentina (two of China's favorite Latin American trade partners) discussed with Venezuela the possibility of building a gas pipeline across the Amazon. A 5000-mile gas pipeline would need a port destination for LNG tankers to supply China. Instead, talk of an oil pipeline through Colombia could be replaced by a gas pipeline.

China's approach, in dealing with what the Anglo-American alliance call "rogue nations," reflects one of reported non-interference in a country's political affairs. It is a Chinese pragmatism, which many find amoral. By contrast, in what way is America judged around the world by

its military invasion of Iraq? When U.S. President Bush recently criticized Vladimir Putin about democracy in his country, the Russian President pointed out that Russia's democracy was quite different from the one the U.S. had created in Iraq for the Iraqis. One has to wonder how long China's laissez faire doctrine will last. And whether China can continue developing new energy silk roads at the rate its GDP growth commands.

Some believe China doesn't need so much oil right now. In the first half of 2006, according to Xinhua news, China's refinery output was seven percent less than the country's domestic crude-oil production. Despite producing 85 million tons of crude oil, China still imported 70 million tons of oil (on top of 12 million tons of refined oil). Is China hoarding to avert a future political crisis, or does it expect its energy 'silk roads' to soon close or become blockaded?

The McKinsey Quarterly researchers also reported if China continues at its current pace, it would need to buy up about three percent of the world's proven petroleum reserves. That's more than all of the reserves held by Chevron, ExxonMobil, BP, Shell and others. As we have been reminded by energy analysts, getting oil out of the ground costs more, the quality of oil is falling and more water is found in the oil. All of this has registered on not only the radar screens of Chinese energy advisors and politicians, but also at the gasoline pumps where filling up a tank should continue to increase every year. As Deng advised about getting rich, it can be glorious. But the furious process of getting there has not only been taxing for China, but also for the rest of the world. (James Finch, 2006)

7. China's Energy Policy: Strategic Implications

When the People's Republic of China was founded in 1949, this country was well able to se provide the energy; even the first two "oil shocks" (1973-74 and 1979-80) had little impact on the Chinese energy sector. But since the early 1980s, China se developed economically in a super speed, which evidently makes China run short of energy. This sparsity situation will continuer and indeed exacerbate in the future. The

paradox between the limit of the local energy and the dilation of need obliges China adopt a multi-faced energy strategy (Table 1).

Several conclusions can be drawn from this discussion of China's energy outlook. First, China's demand for oil will continue to grow in order to satisfy its high economic growth and the needs of its large population. Given the country's stagnant domestic production, China's dependence on imported oil will further deepen. Second, like other major energy consumers (i.e., the EU and the US), China has sought to diversify its oil sources. Supplies from Russia, Central Asia, Latin America, and Canada are likely to contribute to Beijing's energy security. However, Africa and the Middle East are likely to continue to be the main suppliers.

Third, a key challenge to China's energy security is how to control and regulate the rising demand for energy and create the appropriate governing mechanism to achieve this goal. Fourth, China's energy security is increasingly an international concern. The nation's rising demand is pushing prices higher and is raising serious concerns regarding global pollution and other environmental issues. Fifth, securing energy supplies has become a major aim of China's foreign policy. China is likely to play a stabilizing role in international policy to ensure the non-interruption of oil supplies. Finally, Beijing's rising demand for energy should not be seen at the expense of the US or other major consumers. Today's energy markets are well-integrated. The source of energy matters less than its availability. (Gawdat Bahgat, 2007)¹¹

8. EU Overlooks Pitfalls of Central Asian Strategy

8.1 The European Union's involvement in the Central Asia and Caucasus

The EU's interests in the region revolve around energy cooperation and are in this respect not unlike those of the United States and Russia. However, as a newcomer in the region the EU appears to place hopes in

¹¹ Gawdat Bahgat, the Center for Middle Eastern Studies, VOL. XLIX No 3 15-Jan-2007, Department of Political Science, Indiana University of Pennsylvania

the democratic development of countries like Kazakhstan and emphasises the political aspects of its relations with the five countries. But these ambitions seem to have a much lesser impact on the region than Brussels' perspective perceives and European discourse is welcomed with some coolness and skepticism by regional leaders. If it wants to promote real change in the region, the EU must clearly define the political dimension of its strategy and see beyond the appearance of stability.

The 29 March meeting of EU Troika – Central Asia foreign ministers was a significant event above all for the symbolic unity demonstrated by representatives of the five Central Asian nations in Astana. Never before have the foreign ministers of Central Asian states with diverse and largely ill-defined economic and political goals met together to discuss such a globally important issue as energy cooperation with the European Union.

In Central Asia, particularly in Kazakhstan with its multifaceted foreign policy, the EU faces new challenges. Kazakhstan's close relationship with China is a fait accompli which has to be accepted if possibilities of altering it are not at hand. However Kazakhstan's incessant attempts to diversify its energy transportation routes in order to minimize its dependency on Russian pipelines are an encouraging development for the EU's energy strategy in Central Asia.

Would German foreign minister Frank-Walter Steinmeier deign to come to wind-swept Astana if it were not for the gas row last year between Belarus, Ukraine and Russia that shattered Europe's illusion of energy security? That is the question most-asked by analysts in Kazakhstan these days. The popular opinion, which is zealously supported by pro-Russian officials, is that in the current difficult situation, European nations suffering energy shortages need Kazakhstan more than the other way around. EU member-countries' vulnerability to a looming energy crisis takes the wind out of Western sails in the long-running argument about human rights and democratic standards. (Marat Yermukanov, 2007)¹²

¹² Marat Yermukanov, *EU Overlooks Pitfalls Of Central Asian Strategy*, 2007, CAUCAZ.COM

8.2 Energy interests overshadow the human rights agenda

The most salient view which is common to all Central Asian leaders is the deep-rooted reluctance to accept any new standards which may threaten regime security and alter their time-tested authoritarian methods of governance. Askar Shomanov, acting director of the Institute of World Politics and head of the analytical centre of Nazarbayev's administration, reiterated this view. Speaking at a 13 March conference on security issues in Central Asia which was held in Almaty under the aegis of the Friedrich Ebert Foundation, he said that alien models of governance imposed by outside forces could not be embraced by the population.

No wonder that in a country invariably showcased by Western policy makers as a bulwark of economic stability and social harmony, the majority of the population visualizes the ruling regime as a perfect safe haven to be protected against the threat of a colour revolution.

To many outside observers government officials' efforts to reconcile age-old authoritarian rule with new democratic challenges may seem to be successful. Broadly speaking, in comparison with Uzbekistan which has been ostracized by the West for the Andijan massacre or turbulent Kyrgyzstan and impoverished Turkmenistan, Kazakhstan is a better place for democracy to prosper.

Apparently, the EU attaches much hope to some of the positive developments in Kazakhstan such as budding judicial reform, a comparatively good human rights records and efforts to amend the media law and to protect the rights of ethnic minorities.

It is hardly surprising that European democratic institutions carefully avoid harsh language when addressing Kazakh authorities even in cases of obvious violations of democratic norms. When independent journalist Kazis Toguzbayev was given two-year suspended sentence last January for allegedly infringing upon the honour of the president, the EU limited its protest to a mildly worded statement. The mysterious deaths of political figures and journalists Zamanbek Nurkadilov, Altynbek Sarsenbayev, Askhat Sharipzhanov, Batyrkhan Darimbet and Nuri Muftakh went almost unnoticed by the international community. (Marat Yermukanov, 2007)

8.3 Behind the façade

Central Asian countries know that Western policy makers put business before politics when it deals with the energy-rich region. Frank-Walter Steinmeier was no exception in that respect. His counterparts from Central Asia eagerly discussed energy cooperation, but his calls for human rights and rule of law in the region fell largely on deaf ears. Turkmenistan's foreign minister did not appear for the joint press-conference. Vladimir Norov, foreign minister of Uzbekistan could not conceal his irritation, saying that his country would not tolerate any outside interference.

The authoritarian regimes' cool reaction to the political components of the EU's strategy in Central Asia clearly shows that the political reform efforts the EU has undertaken in recent years, including Frank-Walter Steinmeier's five-nation trip to the region last November, have not produced palpable results. Even more discouraging is the fact that few bother to ponder what positive impact the more than 1 billion euros the EU has funnelled into Central Asia's black hole has had on the rural population's living standards. The much-trumpeted campaign launched by the Kazakh government to stamp out corruption looks more like a red herring aimed at creating an illusion of transparency than a genuine intention to purge government offices of top-level bribe takers and multi-million euro embezzlers of public funds. In Kazakhstan only small-time crooks and low-ranking public servants are sent to jail while the real string-pullers in Astana or in regional governments go unpunished.

The wall of alienation between societies and the government and plummeting public confidence in the authorities' integrity are potential sources of trouble in Kazakhstan that may undermine the EU's strategy in the region. As long as press freedom is curtailed at the local and regional level and European monitors see nothing beyond Astana and Almaty, nothing will change for the better. In the future, the EU will have to contribute substantially to the settlement of border conflicts in the region, particularly between Kazakhstan and Uzbekistan, if it wishes to have long-term partners and law-governed states in Central Asia. Shots along the Kazakh-Uzbek border are almost daily occurrences. (Marat Yermukanov, 2007)

8.4 Central Asia as a bridge between the EU and Russia?

Arriving with an attractive energy cooperation scheme including the Odessa-Brody-Gdansk oil pipeline project, Polish President Lech Kaczyński's visit to Astana in the wake of the EU Troika was more welcome than that of the German foreign minister. The visit was further sweetened by Polish support for Kazakhstan's coveted OSCE chairmanship in 2009 and a voiced intention to draw Kazakhstan into mediation between the EU and Russia. However, Germany's strategy for Central Asia will also bear fruit if efforts are continued. NATO's individual partnership program for Kazakhstan, Kazakh peacekeeping forces' performance in Iraq and Kazakhstan's humanitarian and technical assistance to Afghanistan could serve as a solid foundation to promote similar cooperation with other Central Asian nations. Each of the five nations has a role to play in bridging the differences between Russia and the EU on the one hand and the Western and Muslim world on the other hand. To achieve that goal the EU should clearly define the political dimensions of its strategy for the region. (Marat Yermukanov, 2007)

8.5 EU joins race for Central Asian energy

The European Union tiptoed into the race for Central Asia's vast energy resources on Wednesday, but it faces tough competition in a region where both Moscow and Washington are already elbowing hard for control. German foreign minister Frank-Walter Steinmeier brought a host of EU officials for a summit in Kazakhstan, aiming to bolster the EU's role in the strategic region which sits on some of the world's biggest oil, natural gas and uranium reserves. Speaking in the Kazakh capital Astana, Steinmeier said energy was a key element in the EU's strategy for the five states of Central Asia: Kazakhstan, Uzbekistan, Turkmenistan, Kyrgyzstan and Tajikistan. "The EU aims to diversify its energy policy. This is why it is necessary to increase our contacts with Central Asia", he told reporters after talks with regional foreign ministers. "The talks showed that the time is right for a new, closer cooperation". The talks, heavy on rhetoric but thin on detail, were part of EU president Germany's plan to present a paper setting out its ideas for a first EU

strategy for Central Asia. It plans to present the draft plan for approval at a June summit. Rights groups had called on Steinmeier to use his trip to get tough on the often patchy human rights record in Central Asia, particularly Uzbekistan and Turkmenistan whose leaders are often criticised in the West for tolerating no dissent.

Germany has denied the EU is putting energy interests before human rights in mapping out its strategy for the region. It's in our interest that the Central Asian countries take a path to be peaceful, democratic and prospering states, he said. The United States, which has a military airbase in Central Asia, and Russia, the region's former imperial master, are the two main players in the vast Muslim region stretching from the borders of Russia in the north to Afghanistan and Iran in the south. Oil-rich Kazakhstan sees itself as the region's most stable and economically strong country and aspires to become the first state from the ex-Soviet bloc to chair the Organisation for Security and Cooperation in Europe in 2009. Speaking alongside Steinmeier, EU External Relations Commissioner Benita Ferrero-Waldner said Kazakhstan, which has never held an election judged free and fair by Western monitors, needed to show more commitment to democratic reform. (Financial Express, 2007)¹³

ASTANA, March 28 (Reuters) - The European Union tiptoed into the race for Central Asia's vast energy resources on Wednesday, but it faces tough competition in a region where both Moscow and Washington are already elbowing hard for control. German Foreign Minister Frank-Walter Steinmeier brought a host of EU officials for a summit in Kazakhstan, aiming to bolster the EU's role in the strategic region which sits on some of the world's biggest oil, natural gas and uranium reserves. Germany has denied the EU is putting energy interests before human rights in mapping out its strategy for the region. "It's in our interest that the Central Asian countries take a path to be peaceful, democratic and prospering states," he said. (Markus Krah, 2007)

The United States, which has a military airbase in Central Asia, and Russia, the region's former imperial master, are the two main players in the vast Muslim region stretching from the borders of Russia in the north

¹³ Financial Express, Energy-hungry EU joins race for Central Asian resources, Financial Express, 2007

to Afghanistan and Iran in the south. Oil-rich Kazakhstan sees itself as the region's most stable and economically strong country and aspires to become the first state from the ex-Soviet bloc to chair the Organisation for Security and Cooperation in Europe in 2009. Speaking alongside Steinmeier, EU External Relations Commissioner Benita Ferrero-Waldner said Kazakhstan, which has never held an election judged free and fair by Western monitors, needed to show more commitment to democratic reform. "Now we want to see these reforms", she said, adding, however, that there still was "a very good chance to see the first Central Asian country in OSCE chairmanship".

Another regional power, Turkmenistan, is Central Asia's top natural gas producer. The EU is particularly keen to establish contacts with the nation's new leadership following the December death of its long-serving and reclusive leader. But oddly, Turkmenistan's deputy foreign minister, who had been scheduled to speak at the conference, disappeared without a warning after the talks. Asked by a reporter where he was, Steinmeier said, jokingly: "I can't tell you where he is. I hope he did not get stuck in the lift." (Markus Krah, 2007)¹⁴

9. The new energy Silk Road

As energy jitters continue to rattle the global economy, regional alliances are being solidified to ensure that China will remain a viable and growing economy as oil depletion becomes a permanent fixture of our daily lives. As cheap trans-oceanic shipping of non-essential goods goes the way of the dinosaurs, these new partnerships will help realign global trade, and as a result, regional diplomacy. This process has already begun, for example, the story of a peace deal between North and South Korea, which recently appeared on the front page of the China Daily newspaper--"Korean Pact Seeks to End War". Global shipping by air and sea, just-in-time ordering and an endless supply of factory orders have been the bread-and-butter of the modern Chinese economy. It is

¹⁴ Markus Krah, Energy-hungry EU joins race for Central Asian resources, Wed Mar 28, 2007 Thomson Reuters, UK

precisely those systems that will bring this economic juggernaut to its knees if measures are not taken to assure access to a trade zone stretching from Western Europe to Vladivostok in Russia, Mongolia in the north, India in the west and all the way to Singapore at the edge of S.E Asia.

If you take a close look around our world and map out what is manufactured in which nation, you will find heavy industry in China, factories for daily use products spread from Vietnam through China to S. Korea, high-tech goods in Japan and Taiwan, raw materials and resources in all parts of Asia, including gas and oil exports from the Middle East, central Asia and Russia. The Eurasia zone is already connected by pipe, rail networks and a telecommunications hub in India, but today's connections are by no means complete. With construction of a few sections of rail, however, there can be a spider web of steel rail linking it all, despite different rail track standards – some narrower gauge, some wider –creating logistical problems. Currently, a large concentration of the world's energy resources, raw materials, factories, communication and production centers are in the Asia zone. Outsourcing factory production from the West has been a blessing for this region. Factories of every conceivable type are in China and the Information Technology revolution where an optic fiber world is now connected to India's cheap labor and English-speaking skills.

With the groundwork laid, let's take a trip along the new Silk Road, beginning with the rail links that will allow a newly aligned Eurasian trading bloc to emerge. In this zone, China will be the economic powerhouse.

■ **Peace in Korea:** The new China-brokered Korean peace initiative to end the Korean War will open rail links through North Korea to the sea port of Pusan, the closest jump off point to Japan. For comparison, sea delivery from Pusan is just half-a-day by sea, but three days from Shanghai. All production in the N.E. section of China will use this route. Japan is extremely vulnerable to shipping disruptions as most of what is consumed in daily life or manufactured using energy is delivered by ship to that nation.

■ **The Vietnam Connection:** Rail networks are extensive throughout the Mekong Region, but a small 250-kilometre section of rail will be

needed from Ho Chi Minh City to link Phnom Penh, and within Cambodia an 80-kilometre line constructed from Sisophon to Aranyaprathet, Thailand. When these sections are complete, the links in Thailand will access the rest of S.E. Asia all the way to Singapore. Presently there is a great deal of outsourcing from China to Vietnamese factories that produce labour-intensive 100% handmade items. Again you can see the economic mutual benefit trump card being used to China's advantage to secure land passage.

■ Myanmar: The old capital Rangoon is no longer used as a governmental seat, but a new city called Naypyitaw has been constructed 400 kilometres to the north to take its place. The move north puts the new capital more or less in a line with rail connections out of Yunnan Province in China, and onto Aizawi in India's N.E state of Mizoram and a second line could easily be installed to link up at Imphal in the N.E. state of Manipur, accessing all of India. China is giving lip service to the UN censure of the Burmese regime over the slaughter of protesters, including monks. Don't expect them to push strongly for change in Burma until they know which side will triumph. Right now, China has just what it wants; Western sanctions on Burma leaving the country open for exploitation by Chinese business, with the possibility of new Chinese controlled transit routes to ocean ports along that coast, and rail links to India.

Foreign direct investment will continue to pour in as China's central location makes it the transit hub of the new Eurasian trade bloc for those businesses that want ready rail access to the Koreas, Japan, India and S.E. Asia. Gas and oil pipelines will follow the same model, but instead will be a conglomeration of Kazakhstan, Tajikistan, Turkmenistan, Kyrgyzstan and Uzbekistan that will link to the far west Chinese province of Xinjiang. From now to 2010, the Chinese government plans to complete an additional 19,800 kilometres of new tracks and upgrade 15,000 kilometers of existing routes, most if it in the western provinces of Yunnan, Xinjiang and Sichuan. Additionally, a second natural gas pipeline from the Xinjiang region to Shanghai is now beginning construction and will be 4,200 kilometres in length. Sea-borne cargo will become more regional, but with navies from other countries patrolling coastal waters, land delivery routes by rail are essential. This puts China

in an advantageous position to have both land and sea links with Europe, Russia and the Middle-East, if their plans come to fruition.

Trade routes from Europe to China were established over a thousand years ago using camels and fortified positions against hostile threats to commerce. Along the modern Silk Road (Figure 9), transport locomotives will chug along burning coal or heavy-sulfur fuels. This will allow a realignment of trade in Eurasia as we pass into a post-peak oil reality that will redefine civilization. (David DuByne, 2007)¹⁵

9.1 Energy Silk Road grows

China's State Councilor Tang Jiaxuan attending the China-Arab Cooperation Forum Ministerial Meeting in Beijing. The forum is a sign of growing ties between the regions. The traditions of trade along the Silk Road may be reprised as India and China look to the Middle East for their energy needs. The new relationship the Middle East has with China and India has led to the rebirth of the Silk Road analogy: Chinese silk and Indian spices have been replaced by modern energy investment into the Gulf. Commentators are forecasting that this century will belong to Asia, with China and India at the forefront. The Middle East has started to prioritise energy supply towards Asia and away from the traditional western markets. This coincides with Asia's surging demand for oil, as well as a need to ease carbon emissions resulting from dependence on coal. "Only two years ago companies in China and India would conduct their business with the Middle East over the phone," said Kenneth Borda, CEO of Deutsche Bank in the Middle East and North Africa. "But today these companies often start their road show with a visit to Dubai, Riyadh or Kuwait."

Moreover, China and India are preoccupied with obtaining energy security to guarantee their growth. Without foreign energy supplies they cannot maintain growth rates, currently approaching 10% per year. "China and India are the most important markets in the world simply because of their growth potential," said Sultan bin Sulayem, UAE

¹⁵ David DuByne, The New Silk Road: rail links from China, Energy bulletin, 2007, <http://www.energybulletin.net/node/35991>

chairman of Dubai World. Noting that for the first time, Asia surpassed North America in 2004-2005 as the foremost oil consuming region in the world, Jeroen Van Der Veer, CEO of Royal Dutch Shell, forecasts energy consumption will increase globally by 50% in the next 25 years. Much of this growth will be seen in China and India. Daniel Yergin, co-founder and chairman of Cambridge Energy Research Associates, referred to this phenomenon as the 'Asian Phoenix' and said Asia will continue to account for the lion's share of the global economy.

The Chinese economy is heavily export and trade oriented. According to the China-Arab World CEO Guide, China was responsible for 40% of the growth in world oil demand between 2000 and 2004. Demand is rising quickly and consumption could increase tenfold in absolute terms over the next three decades. At the same time, domestic crude oil production has stagnated. The resulting level of imports and investments in the Middle East has made China one of the most significant players in the world oil market. "China's trade with the Arab world has grown tenfold over the past decade to US \$51.3 billion - about 40% of which is oil related", said Tang Jiaxuan, state counsellor of China. "Trade volumes between the two sides could double to as much as US \$100 billion by 2010 by facilitating the free flow of goods, capital, technology and services." At the same time, China's existing oil fields are approaching the end of their usefulness; technologies are outdated and the country's newly acquired reserves are expensive to extract. "We're working on increasing efficiency of the supply chain between these two countries and the Gulf," said Mohammed Alshaya, CEO of Alshaya Retail.

"We hope to see a joint venture in refineries in China and India because these countries are growing markets for Gulf oil. There are also opportunities to develop joint ventures with respect to tankers and pipelines."

Iraq is keen to encourage Chinese companies to invest in its oil fields. This is part of Iraq's attempt to double its daily production to six million barrels per day by 2012, according to Hussain al-Shahristani, Iraq's oil minister. "Iraq will significantly increase its oil production in the next few years and China will significantly raise its imports. That's why the two countries will need to work closely together," said al-Shahristani at a press conference in Beijing. China National Petroleum Corporation

(CNPC), the country's largest oil producer, is said to be willing to pay millions of extra dollars to secure the exploration rights for Iraq's Ahdab oil field under a deal Beijing signed during Saddam Hussein's regime. CNPC has also recently held talks with National Iranian Oil Company (NIOC) to develop the giant Kish gas field in the Gulf. Kuwait has invited Chinese firms to participate in a US \$8.5 billion project to boost crude oil output from its northern fields.

Beijing had been thought to be out of the running for major contracts in post-war Iraq, with the best deals going to the US and its allies. But the upsurge in violence has made the country less attractive to investors in the west. Beijing clearly recognises that as domestic demand for oil grows, so must its dependence on the Middle East. It is exploring pipeline plans to cut the time and cost of sea journeys, stepping up its diplomatic engagement and promoting investment where there are still assets it can afford. "China is investing in more peripheral Middle East countries like Yemen, Oman, the UAE and Syria," said Gavin Thompson, a Beijing-based consultant at energy analysts, Wood Mackenzie.

China and India have also endeavoured to improve their relations with Saudi Arabia, the world's largest oil exporter. In 2004 Saudi Arabia and China decided to hold regular political consultations and China's state oil company, Sinopec, signed a deal to explore gas in Saudi Arabia's vast Rub al Khali. Saudi Arabia accounts for about 17% of China's imported oil. India has emerged as the kingdom's fourth-largest destination for oil exports. Riyadh is the largest supplier of oil to India. India, like China is reshaping its diplomacy to serve energy requirements as its booming economy also needs new supplies of oil to ensure continued growth. Reliance, a private Indian energy firm, has invested in a refinery and petrochemicals project in Saudi Arabia, while the Oil and Natural Gas Corporation, India's state-owned energy firm, will engage the kingdom as its equity partner for a refinery project in the Indian state of Andhra Pradesh. January's visit of the Saudi monarch, Abdullah bin Abdul Aziz al-Saud, to India saw the signing of the 'Delhi Declaration', a wide-ranging call for Indo-Saudi partnerships in the critical energy sector, as well as major investments in the petroleum sector.

As with China, India sees significant investment opportunities in Iran. The Gas Authority of India has signed a 30-year deal with the National

Iranian Gas Export Corporation for the transfer of up to 7.5 million tones of LNG to India per year. The deal, worth an estimated US \$50 billion, will also entail Indian involvement in the development of Iranian gas fields. In addition, Indian officials are discussing the construction of a US \$3 billion natural gas pipeline from Iran to India, via Pakistan. If completed, the pipeline would provide both countries with a substantial supply of gas. "It is clear India and Iran are two countries that complement each other in the field of oil and gas. While Iran has vast reserves of oil and gas, India is forever energy hungry and both can provide each other's needs," said Annamalai Chidambaram Muthiah, president of the Federation of Indian Chambers of Commerce and Industry.

But for all the investment opportunities in the Middle East, India and China have approached with caution, wary of the fluctuating energy prices, which are pivotal to their domestic stability. Indian and Chinese firms are no longer willing to pay large premiums to secure oil supplies, yet they do not have the technical expertise that Western firms use to woo producers. At the same time, Middle Eastern countries are worrying less about finding outlets for their oil all the time global demand is booming, prices hit near peaks and export refineries continue to set up across the region. While both sides have established numerous preliminary deals, few of them have gone beyond the initial phases. "The relationship between China and India and the Middle East is still unbalanced. China and India need the Gulf more than the Gulf needs China and India, because of their reliance on energy," said Borda. "The challenge is to bring greater parity to the relationship."- Kenneth Borda (ArabianBusiness.com, 2007)¹⁶

¹⁶ ArabianBusiness.com, Energy Silk Road grow, staff writer on Thursday, 01 March 2007

Figures and Tables



Figure 1: Central Asian countries

Source: www.answers.com/topic/central-asia



Figure2: China would like all silk roads leading back to its country to be laden with oil and gas

Source: James Finch, (2006)

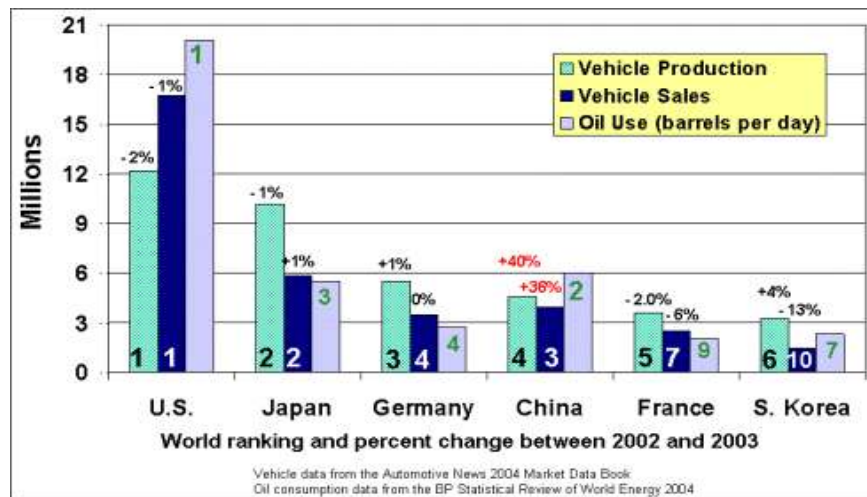


Figure 3: World ranking and percent change between 2002 and 2003
Source: James Finch, (2006)



Figure 4: Today's "Silk Roads" are pipelines which deliver oil and gas to an energy-hungry China



Figure 5: Will Russia and China someday battle over Kazakhstan's energy resources?
 Source: James Finch, (2006)



Figure 6: China hopes to protect Iran from suffering the same fate as Iraq, where China lost valuable oil concessions after the U.S. invasion
 Source: James Finch, (2006)



Sudan



Angola

Figure 7: China develops ties with countries scorned by the rest of the world. China now depends upon Sudan for oil; hopes to build up Angola for its oil resources, source: Source: James Finch, (2006)



Figure 8: Venezuela holds one of the world's largest oil resources and South America's largest natural gas reserves
Source: James Finch, (2006)



Figure 9: This is a map of the famous Silk Road of centuries past. The New Silk Road is a different matter entirely.
Source: (David DuByne, 2007)

Table 1: A multi-faced energy strategy adopted by China

Energy strategy	Contents
Reform Of Energy Sector	China's government agrees that they have to ameliorate the actual Energy Department to face for the future expanding the high economic growth. In fact since 1955, China keeps changing the form of national energy agency, on changing the name, the organization and even the function. These continuing changes suggest that China lacks a strong national mechanism to oversee its energy sector.
Vulnerability To Attacks	The country's vulnerability to attacks by terrorists or pirates turn into a real problem in the case that China imports more and more foreign oil. Actually Chinese-own conveyance transports only very little part of the imports products; China begins to construct its own transport capacity in the subject to ship more imports by it self.
Diversification Of Energy Mix	As the first consumer of carbon, all these fossil fuels bring large numbers of problems such as serious environmental pollution, threatens the sustainable energy supply, etc. Nowadays the natural gas takes more places in the energy used, and China plans to decline the consumption of coal; but this tendency can't be the real solution, the imports more important and the brand new strategy in future can be predict! If we take a look outside of the country, certain politic is also being practiced to

	meet the needs of energy. The Middle East and Africa provide sequentially more than half of China's oil needs, China has already diversify import sources; secondly Chinese companies have sought to establish a presence mostly in countries where US and European companies are absent. The dramatic political situations between China and some countries play an important role in the China's energy strategy.
China and Russia	Geographically they really should make cooperation; they are both against "American hegemony", they have commendably ameliorated their relationship since years; above all these, the most important are that, Russia is a big provider of energy and China is a big customer.
Central Asian & African and China	For them, China is a country who has the power to help them in UN; in other words China is viewed as a potential protector and ally on the international scene. They're the ideal energy suppliers for China.
The Middle East	Middle Eastern oil producers share significant commercial and strategic interests with China; with the rupture of the relationship between USA and the Middle East, and the dramatic improvements between Beijing and Riyadh, China has secured and developed this side of its suppliers.