

The market in China – An interesting challenge

JAMES BRUNO

Chemical & Pharmaceutical Solutions
jamesbruno1@optonline.net

A recent conversation began with the current outlook of the manufacturing. In principle, labor rates were going up – often double digits. Energy and waste costs are on the rise. Factories are losing money and we expect to see closures occurring. Capacity in general in the manufacturing sector continues to grow and an overcapacity situation could occur soon. If you think this conversation was about Europe and the US, you may want to look a little closer. China has seen an enormous growth over the last few years and with that growth comes increasing costs. In addition, with a more profit driven economy, some companies will fail to make it in the next few years and profits will be squeezed.

Today China represents the fastest growing market for chemicals in general. Recently KPMG reported that the petrochemical industry is growing more rapidly than the overall economy. This growth is being pushed by the demand for manufacturing and construction industries as well as the investment in plant construction (1). In 2006, gambling revenues from the port city of Macau in southern China exceeded those of Las Vegas. The GDP in China continues to lead those of all of Asia and the confidence in the region is high and companies continue to invest heavily in this region. BASF reported in *C&E News* that they expect "Asia will be the growth driver, especially China" (2).

CHENG SIWEI, Vice-Chairman of the National People's Congress and a very influential person in the financial circles warns of the bubble bursting soon. The recent growth in the stock market may fuel changes and additional attempts to slow down the growth. Mr. CHENG also warned that over 70% of the companies listed on the companies do not meet international standards (3).

The *China Economic Quarterly* (CEQ) reported that the economy was slowing down a little and the GDP was reported to be at 11.3% for the 3rd quarter down from 14.5%. Overall investments were slowing a little and the growth was down to 23% per year down from 30%. While for most of China's sectors, export exceeds important for chemicals, the opposite exists (4).

Overall, the labor rates in China have been driven upward. Many companies have begun to move further out of the larger cities and deeper into the countryside. This will restrict the ability of these companies to acquire high levels of technical people. In addition, with the number of construction projects underway within the country, there is often a shortage of engineers and qualified workers (5). At the same time, the quality of the schools increases. Recently, several business schools within China received international certification for their programs.

In addition, many people who left China years ago and have lived and worked in the west are returning. Many of these people are coming home to high paying jobs and a standard of living similar to what they have in the west. As we see the growth in the pharmaceutical sector, it becomes apparent that they are looking not only for higher wages but also for a higher standard of living. Interesting enough as reflected in the desire to have a higher standard of life, the wine industry in China is expanding and the number of vineyards is up and they plan to begin exporting a high end "Chairman's Reserve" estimated to cost \$ 80/bottle.

Energy costs in China continue to increase. Consider that the growth portion of the global energy market is driven by China; any increase in the cost of a barrel of oil could send shock waves through the economy. There is no indication of this

published by  srl
Via Cesare da Sesto, 10
20123 Milano - Italy
Tel. 0039 02 83241119
Fax 0039 02 8376457
www.b5srl.com

slowing down either. Even with the investments in alternate fuel sources within China expect the cost of oil to be a major concern for China's industrial sector.

Turning to China to produce products for the US market is expected and should be part of any long-term strategy. The ability to scale up and to rapidly expand production cannot be equaled in the West. None of this is without risk. Current low cost of capital will change as the need for capital in China increases and there is more competition for these resources. This could result in a much higher cost in the near future and hinder some companies from expanding.

While China should be an important part of the long-term strategy of any company, many companies overlook the hidden costs associated with producing in China. The resources within the company that will be required to support these activities are often not factored into the equation. Many of the Chinese companies need help with the compliance to both FDA and EPA type regulations. In addition cost and time associated with plant inspections and document reviews can be considerably higher than working in the west.

The lack of skilled labor pool will result in more problems going forward. The larger research institutes will compete for these people and only help to drive up labor rates. As expansion continues in all sectors, the strain for an educated and skilled labor force will only increase.

One must not forget that China is more than just a key location for outsourcing. With a GDP greater than \$ 8.8 trillion, China is currently the third largest economy in the world. In addition, foreign investment continues to increase. In 2003, this investment topped \$ 70 billion and by 2006, the government actually looked to slow this investment down (7). In addition, over the last few years China continues to be a major importer of chemicals, *C&E News* reported that the estimates for pharmaceutical imports to China would be \$ 2,325 million while they expect that it will export \$ 1,485 million during the same period. The same report estimated that the organic chemical imports should be in the range of \$ 29,000 million while the exports are only \$ 15,000 million (5).

Companies investing and working within China have had to overcome many problems. The language, customs and overall size of the country are not the least of these issues. In 2003, the Chinese government overhauled the SFDA to bring this more in line with global regulatory agencies. One of the main areas of improvement came in audits and cGMP procedures.

At the same time, China began to

relax its historical opposition to foreign ownership of companies operating in China. This allows Western companies to access capital now on a more friendly term (6). Prior to this, investments were linked to joint ventures and related types of partnerships. These often were destined to fail from the beginning.

Before this, companies investing in China had to deal with intervention from the government. In addition, inadequate control and protection of intellectual property (IP) made many companies reluctant to invest within China. Lonza pointed out in its expansion at the Nansha plant that the stability of the work force posed a real problem for the security of IP. Considering that Lonza plans to employ over 600 people at that site by 2008, this would be a major consideration (7).

Considering the original intent of investing in China was to take advantage of low labor rates, increased costs make this model difficult to work with in the future. The window around a low cost operation may be closing. However, there are more valuable reasons to invest in China now and to deal with the overall problems that one needs to encounter. The primary issues are that a company going into China needs to develop an effective strategy not necessary dependent on low cost suppliers.

Currently, IMS ranks the Chinese market at 9th in the world and expect within ten years it will be ranked 6th. In addition, the population is aging and the need for medicines to control a wide range of illnesses should continue to grow (8). In 2003, the largest population in the world spent \$ 20 per capita on health care. At the same time the US spent \$ 700 per capita. At the same time, the medical insurance needs to develop and at the present item covers about two thirds of the population (11).

China becomes more attractive as one considers the overall situation. While the cost of capital is still considered low, the overall cost of doing business and developing products within the country could be more interesting. The cost to develop a drug in China is estimated to be one third of the cost of doing this in the US. In addition to the lower cost, it also opens opportunities to Western companies to launch their products in China.

One may consider that technology could be one of the hurdles to move into the more lucrative markets like biological and biopharm type products. This would be a mistake. Today, there are 30 recombinant products already launched in China. In addition, there are nearly twenty blood and over 300 biondiagnostics already approved and on the Chinese

market. The potential for reasonably priced biogenerics is great. A number of companies are already developing internally vaccines, growth hormones and biological products. In 2005, the China biopharmaceutical sales revenues exceeded \$ 3.8 billion and represented over 7.5% of the pharmaceutical sales that year (9).

The biogeneric market in China is growing and becoming more sophisticated. Wuhan Institute; Shenzhen Neptunus; Shanghai Institute of Biologic Products and Sinovac have all developed various vaccines. Chengchun Gene Science has launched various growth hormones and Chengdu Rongsheng Pharmaceuticals has Human Albumin products. The number of companies and the products continues to grow annually.

A number of companies have already turned to China and invested within the country for domestic production and research. Companies like Novo Nordisk, AstraZeneca, Lilly, Roche and GSK have long established relationships or facilities within China. These relationships go beyond manufacturing and basic R&D and clinical development is moving to China as well. AstraZeneca has collaborations with 139 hospitals and research institutes in China. Contract Sales Organizations (CSO) are also providing additional support to companies after the products are launched (10). In general, several manufacturing companies reported that they are looking to establish small technical centers in China to take advantage of the low cost. Several contract organizations have already established some R&D resources in China. We can expect to see this to effect the CRO's more in the future.

All of this has helped lead to a very promising pipeline of products for China. Today, there are over 150 products biological products in clinical trial. China is the first country to complete a Phase I trial for a vaccine for Severe Acute Respiratory Syndrome (SARS). The lack of financial support and overcapacity will drive many of the companies to look for partners in the West. However with the development of products like Sifuvirtide (HIV fusion inhibitor) by Tianjin Fusogen Pharmaceuticals entering Phase II clinical trials and Shanghai Sunway Biotech development and launch of a recombinant Human Adenovirus Type 5 Injection, it would seem that the pipeline is there.

One may want to consider that even with a very large population, the bulk of the pharmaceutical market is still in herbal medicines. The World Health Organization (WHO) estimated that today, the herbal remedies accounts for 30-50% of the total medical consumption. The global market for herbal medicines is estimated

to be over \$ 60 billion and growing. The use of natural medicines is becoming more accepted. This has not been missed by the industry. Dragon International plans to acquire Jinguang Pharmaceuticals in a bid to enter the growing herbal market. Jinguang is producer of herb medicines. Merck KGaA signed a deal with Chi-Med. Merck KGaA will co-develop small molecule anti-cancer drugs (11).

As we look to the China market, the question is it friend or foe. It is a very large growing market. It is becoming a blend of expensive complicated medicines developed in the west with a mixture of herbal and internally developed medicines. The population continues to age and the desire for better medicines points to a growth opportunity for many companies while the internal production could be consider a real competitor. The concerns for intellectual property, distance and language will continue to hinder the market growth.

The barriers to enter the market are still great. However, like any long-term plan, one needs to look to the future and prepare. I believe that in the West, we still have better access to both technology and capital. The ability to invest in the future could still be one of the West's

greatest strengths. More sophisticated manufacturing processes and greater efficiencies in manufacturing can still drive us to be competitive in this market. However, we need to face the cold facts that in the West we need to stop producing products that do not make sense. Covering marginal cost contributions or overheads will not allow us to be competitive in the long run. Some companies have already started to take a painful look at profitability and drop marginal products.

From the author's point of view, the market in China represents an interesting challenge. It does represent some very good opportunities. Blending their chemical expertise with those of the companies in the West will open opportunities for both sides. I believe that if we developed more of the business opportunities, it will open the door to developing products for the Chinese market and increase business opportunities for those companies in the West. I am looking to China as I would look to any other potential supply agreement. Find a good partner; develop a strong relationship build on mutual trust and strength and of course find a place to share a good bottle of wine and a good dinner.

REFERENCES

- 1) BOSWELL C. "What is the Buzz About" *ICIS*, **2007**, Jan.08-14, 18
- 2) "World Chemical Outlook" *C&E News* **2007**, 85 (2, Jan.08), 13
- 3) TUCKER S., DYER G. "Warning on the China Bubble" *Financial Times* **2007**, Jan. 31, 1
- 4) DAVIS N. "China Chemicals to Power Ahead" *ICIS*, **2007**, Jan. 22-28, 17
- 5) ROBERTS D. "How Wages are Changing the Game in China" *Business Week* **2006**, March 27, 32
- 6) "World Chemical Outlook" *C&E News* **2007**, 85 (2, Jan.08), 13
- 7) TREMBLAY J.-F. "Lonza Grows Roots in Southern China" *C&E News* **2007**, (2, Jan.08), 32
- 8) IMS; 10th Annual Insights Seminar; DCAT 2006, New York, March 22; KERMANI F. "China: A market of Challenges and Opportunities" *PharmaChem* **2006**, 5 (6), 2
- 9) ZHOU E.Y., LANGER E. "Defining the Chinese Biopharmaceutical Market" *BioPharm International* **2007**, Jan.01, 16
- 10) ZHOU E.Y. "Opportunities in Biopharmaceutical Outsourcing in China" *Bioprocess International* **2007**, Jan.07, 16
- 11) REYMOND E. "Traditional Chinese Medicines Draw Pharma's Attention" *In-Pharm Technologist.com* **2006**, 21.11