

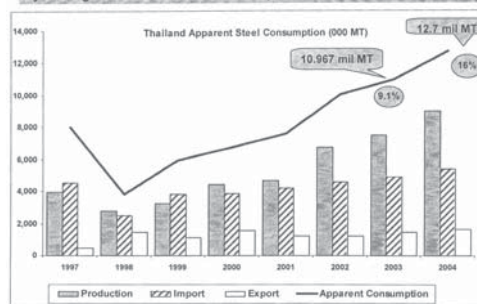
# Thai Steel Industry Poised for new dimensional growth

- Dilip Kumar Jha

After having been overlooked, now steel is an interesting industry in Thailand for business potential as it has grown much from the past. Overall, Thai steel consumption in 2004 has posted a monumental increase by 16% to reach 12.7 million tonnes. Domestic output too has posted a significant growth. Thai steel producers have mounted their capacity utilization with the total amount of 9 million tonnes, rose from the previous year by 20%. The major reason was World's steel price increasing, result in the domestic steel mills, especially rebar, widely accelerated productions in the early 2004. Import volume did not improve much this year. The new record is at 5.4 million tonnes, rose by 9% y-o-y. However, the export volume increased by 13% to reach 1.6 million tonnes.

Growing with an increase of construction, automobile, and electronic appliance industries, overall apparent consumption of flat steel product ramped up by 12% y-o-y to reach 7 million tonnes. Domestic output remained buoyant with

Thailand Steel consumption grew at the rate of 16%, driven mainly by the high increase of domestic output



the growth rate of 17% y-o-y. Meanwhile, the export volume this year ramped up significantly by 20% y-o-y. The output exported the most was hot rolled coil. In the second half of 2004 huge quantity of HRC was exported, especially to USA. HRC and slab prices rose to \$720-780/tonne and \$530-550/tonne respectively.

## ASEAN and Thailand

Having been lagged behind, Thailand has now become the largest steel consuming country within ASEAN. The growth rate of 16% has posted Thailand to be the highest growing market in the region with total steel consumption of 12.76 million tonnes. Total steel consumption in Thailand has poised proportion at 34% of total consumption in the region. To certain extent it can be said that Thailand is now the leader of the ASEAN countries. However, many emerging countries are now looking forward to invest and taking advantages on ASEAN growing market. Apparently, Vietnam has grown up as the second highest growing market in the last few years. Vietnam has conducted several studies in order to develop its steel industry to be more competitive. Other

ASEAN countries like Malaysia and Indonesia are also working very hard to improve their steel industry competitiveness. Having known this, the country has to strengthen its steel industry to stand at the leadership position and develop Thailand to be seen more competitive in term of productivity as well as sustainability. Thai government and private sector are now working very closely to make sure that the key strategic plans will be achieved.

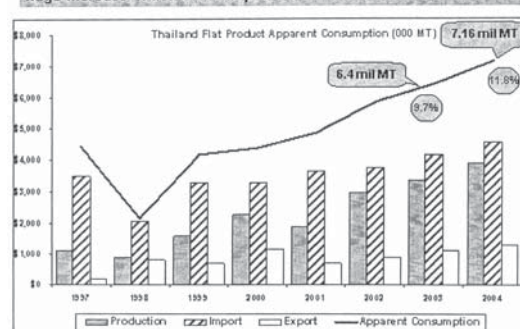
Thailand consumed 12.76 million tonnes in 2004 while Malaysia totaled at 7.7 million tonnes. As far as sectorwise consumption goes, construction industry topped the list with 7486 thousand tonnes (up 18%) followed by automotive industry with 1498 thousand tonnes (up 22%). Industrial consumption shot up by 12% at 1426 thousand tonnes. The flat and long products ratio recorded during

2004 is at 60:40.

## Long product consumption

Long product consumption grew robustly at the rate of 22% to reach 5.6 million tonnes in 2004. Domestic producers still enjoyed strong expansion in construction sector with its output totaled 5.1 million tonnes, rose by 22%.

Flat product consumption grew at 11.8% in 2004, mainly due to the huge increase of domestic output.



Import surged modestly by 5%, while export slipped down sluggishly by 6%.

Albeit such a strong growth of steel demand within the country, Thailand still has to import most of steel product, especially high quality grade flat products. Meanwhile, export volumes have kept stable at all times. The increase during these two years happened due to the huge increase of global steel demand, in particular, the demand in China last year. Total steel import in 2004 was recorded at high level, taking a value of 301,598 million baht or at 10% of total national import value. This is considered as the fourth highest import value in the country, following the import of oil and fuel, electronics and machinery parts.

## High demand pushes higher growth in imports

The high rate import is resulted by Thailand's production limits. When scrap supply is less than the country's demand,

increases electric arc furnace (EAF) mills need to import more scrap. Meanwhile, producers of final products, also, have to import more semi-finished both billet and slab. Furthermore, the expansion of downstream industries, including automobile and appliance, that need to use high-quality steel, causes Thailand to import more steel to meet the demand. There are, still, many steel products Thailand cannot produce to support the downstream industries, especially steel sheets (including hot rolled sheet, cold rolled sheet, and coated steel, which are vastly required, at around 1.8 million

**Challenges and pathfinders**

Nothing comes without sacrifice and the steel industry in Thailand is no exception. The utmost steel capacity in Thailand is steel making capacity. Major raw material is scrap to serve in electric arc furnace mills to produce semi-finished products, namely billet, slab and bloom. With current capacity of 3.4 million tonnes of billet, domestic producers pumped up their capacity by only 62% and the rest the country still needs to import. Talking about finished products, the country has approximately upto 8 million tonnes of bar capacity within the country. But domestic

producer utilized only 30-40% of total capacity. Chronic overcapacity in long product sector has become a major problem and has strong effect to all sectors in the industry. Huge overcapacity will continue to occur despite a strong growth of demand. Most of the producers are producing a commercial quality grade product with flat cost curve. This has resulted in the cut-throat competition, and worsen by sub-standard products launched into the market. Flat products sector has also faced

overseas. In addition, due to technology constraint, cold rolled producers can not produce some of cold rolled sheet grade products and consequently the country needs to import. Last but not the least, chronic overcapacity for bar producers has been a severe problem as a result.

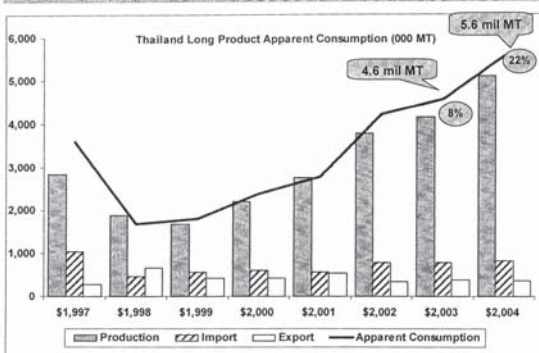
The study has come up with three-key strategic plan to solve chronic problems and improve domestic steel industry to be internationally competitive. First, is to develop upstream industry in order to improve product quality starting from quality of raw material to the finished product category. Moreover, establishment of domestic iron making facilities will decline import in both semi-finished and finished productions. To import iron ore, coal, and fuel instead of scrap will help Thailand able to adjust and trade balance from this production sector, also create a value added opportunity that will spread into many sectors' incomes: profits of firms' performance, employment in projects, domestic raw material and equipment orders, freight, etc. Finally, these incomes will circulate in the country's economic system that will cause many positive effects. Second is to improve steel processing to reduce product cost and enhance product quality. This will help domestic industry to be able to produce high-end products that will turn to be new market trends. Third is to create long term downstream networking. Co-operation between steel producers and downstream sectors who are main steel consuming sectors and are necessary to improve quality of products together.

**Progress on right track**

Currently, there are two upstream projects on the run. Sahaviriya Group has proposed to invest on 30 million tpy iron making mills which consists of total 5 phases. The first phase has already been approved by the Board of Investment (BOI). The approval of the remaining phases is subject to the performance of the first one according to its schedule. G-Steel project of a 2.6 million tpy upstream mill has also been approved by BOI.



Long product consumption grew further with high increase in domestic output.



tonnes/year.

Finished steel product import value amounted to 83,852 million baht in 2004 as compared to 66,997 million baht in the corresponding last year. The import of semi finished products valued 79,154 million baht in 2004 as against 46,101 million baht in the last year. Raw material imports amounted to 33,072 million baht in 2004 in comparison with 14,969 million baht in 2003.

**Projections**

Thai steel consumption is expected to escalate throughout the decade mainly looking at the growing construction and electronics & electrical industries. Steel consumption is projected to rise up to 16 million tonnes in 2007 and is expected to reach 18.6 million tonnes in 2010. The million dollar question is whether or not domestic producers will gain benefits from this. Is the industry geared up to sustain such a high projected demand growth?

a problem of non-competitiveness.

Thai government in association with Iron and Steel Institute of Thailand, have conducted a Thailand steel industry transformation plan. Three main issues have been addressed. First issue is that the country does not have competitive upstream supply. Domestic EAF mills have to import scrap since there is no sufficient scrap supply within the country. At the same time, rolling mills have to import billet and slab to serve their rolling lines. For that, the main problem is that the industry can not control prices and quality of the raw material and the hot rolled products as a consequence. Secondly, the import of downstream products such as cold rolled sheet, coated sheet and wire rod, is necessary because there is not enough domestic capacity to produce quality grade products. At the moment, there are only a few wire rod producers who can produce high quality wire rod and they have to import high quality billet from