STANDARD &POOR'S

Sunpower Group Limited

SGX: SPWG

June 1, 2005

Equity Research / Asia

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NEW ISSUE REPORT

	S$
ESTIMATED FAIR VALUE:	0.34
CURRENT PRICE:	0.245

FINANCIAL SUMMARY – ANNUAL (S$ mln)

FY DEC.	2004	2005F	2006F	2007F
Revenue	40.1	54.0	80.2	82.0
EBITDA	9.2	12.7	19.8	14.6
Net profit	8.3	10.8	15.2	11.3
EPS (cents)	3.0	3.3	4.6	3.4
DPS (cents)	nil	nil	nil	nil
PER (x)	8.2	7.5	5.3	7.1
Dividend yield (%)	n.a.	n.a.	n.a.	n.a.

Profile

Sunpower Group, incorporated in Bermuda and recently listed on the SGX-SESDAQ, provides customized energy saving and environmental protection solutions in China. Its main products include heat pipes and heat pipe exchangers, pipe supports, pressure vessels, and waste gas & energy recovery systems currently used in a variety of industries such as petrochemical, steel and transportation etc. About 54% or S$4.5 mln of the IPO net proceeds will be used to fund the expansion of its production facilities in Nanjing, China to manufacture proprietary products.

Key Positives

- China's energy and environment constraints necessitate better energy savings and pollution controls. This presents good market potential for Sunpower, propelled by the wide applications and leading edges of its innovative solutions and products.
- Continued strong demand from petrochemical and steel industries could drive an earnings growth spurt in the near future, helped by the high-profile Qinghai-Tibet Railway project and the penetration into more industries such as coal liquefaction.
- Strong R&D capability, proprietary technical solutions and established customers are some competitive advantages. Sunpower currently has 11 patents registered in China.

Key Negatives

- Earnings could be volatile given its project-based business model, leading to relatively low visibility complicated by fluctuations in product prices and raw material costs.
- Capacity investments in petrochemical and steel industries tend to be cyclical, though the replacement and upgrading needs of existing facilities and the entries into more industries may help to mitigate some volatility.
- High current profitability might be unsustainable, should technologies proliferate and competition increase. Apart from a relatively short profitable history, Sunpower is also highly dependent on its core customers.

EXECUTIVE SUMMARY

- We value Sunpower at S$0.34 per share based on a combination of intrinsic and relative valuation using discounted cash flow and a comparison to its Asian peers in similar business. Our fair value estimate indicates a potential upside of 38.8%.
- As products are mainly used by petrochemical and steel companies for energy saving and environmental protection, demand drivers include newly built factories, expansion and upgrading of existing facilities and major overhauls of production systems. Innovative applications and penetration into more industries could also provide new revenue sources, as in the case of supplying heat pipes for the Qinghai-Tibet railway and providing energy recovery system for Shenhua, the largest coal producer in China.
- China suffers from high costs and the ravages of pollution due to inefficient use of energy. With strong government mandate for greater efficiency and cleaner air amid severe energy crunch, there could be good potential demand for innovative solutions that recover energy to reduce pollution, such as the group's waste gas and energy recovery systems which boast a fast payback period of 6-12 months and save up to 10% energy costs apart from reducing pollution charges.
- Looming overcapacity and concerns about property bubbles are leading to more curbs on the steel industry. However, with an estimated 150 mln tons of new capacity under construction, capacity expansion could remain strong in the near term. In addition, China has many wasteful steel, chemical, paper and power plants relying on decades-old coal-fired turbines, which need to be replaced by more efficient equipments.
- Driven by import substitutions, the petrochemical industry has seen aggressive investments in recent years. As the sector is prone to periods of excess capacity and given current expectations for petrochemical prices to ease in 2007, we expect capital expenditure growth to slow down in 2007 and 2008. Nevertheless, we believe more spending is likely in the future to improve energy efficiency from both an economic and regulatory standpoint.
- As a technology-based company, we believe Sunpower's future success is ultimately dependent on constant innovations in technologies and expansions into new higher value-added products riding the evolution of customers' demand. There appears to be some sort of strategic fit, as management strategy is centered on product development through more vigorous application R&D efforts.
- Against this backdrop, we project 2005 and 2006 earnings to rise 29.9% and 40.9% YoY on a 34.6% and 48.5% YoY growth in revenue, respectively. We note current order book of CNY151 mln, about 75.2% of 2004's proforma revenue. We have assumed revenue contractions in 2007 and 2008, reflecting our assumptions of some cyclical softness in the petrochemical and steel industries.
- The Executive Chairman, Mr. Guo Hong Xin, an academic-turned entrepreneur who has about 15 years of research experience in heat pipe technologies, leads management. He remains as a part time professor in Jiangsu Polytechnic University.
- The key risk to our earnings forecast centers on the difficulties in projecting Sunpower's order book and raw material cost. We consider Sunpower's earnings transparency and stability to be relatively low due to project-based non-recurring income. Other major risks could include margin fluctuations, project risks, tax regime changes, technology obsolescence and high dependence on core customers etc.

AT A GLANCE

Fully diluted PER (2005F) @ S$0.245	7.5x
Dividend yield (2005F) @ S$0.245	0.0%
Share capital	329 mln
Market cap @ S$0.245	S$80.6 mln (US$49.1 mln)
Net cash / (debt) (2005F)	S$18.0 mln (US$11.0 mln)
Major shareholders	Guo Hong Xin (23%), Li Lai Suo (21%), Ma Ming (17%)
Listed On	The Singapore Exchange SESDAQ
Recent IPO Details:	
Shares offered (mln)	113.2
Consisting of:	
New shares	49.0
Vendor shares*	64.2
IPO price (S$)	0.22
Amount raised (S$ mln)	24.9
Proceeds to:	
Company	10.8
Vendors*	14.1

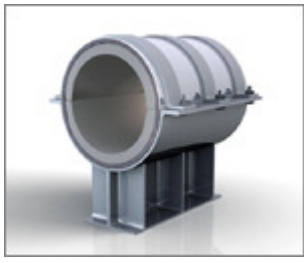
*19 shareholders offered a significant portion of the vendor shares, totaling 34.2 mln. These shareholders had previously granted convertible loans to Sunpower, which have been converted to shares in conjunction with the IPO.

EXHIBIT 1: SUNPOWER'S MAIN RPODUCTS

Heat Pipes

Heat Pipe Exchanger

Pressure Vessel



Pipe Support

Waste gas recovery system with torch gas in background

Source: Company Data

COMPANY DESCRIPTION

BUSINESS DESCRIPTION

Sunpower primarily designs and manufactures heat pipes and heat pipe exchangers, pipe supports and pressure vessels for use in a variety of industries including petrochemical, steel and transportation. These products are made of steel and are generally used to help regulate heat lost and produced during the production or transportation process. Sunpower has also introduced a waste gas and energy recovery system. It employs about 300 people at the company's production center in Nanjing, currently running at near full capacity. Sunpower generally manufactures products and components relating to its proprietary technologies and outsource the others to subcontractors.

Its main customers are China National Petroleum Corporation (CNPC – parent of PetroChina) and the Sinopec Group, which historically comprised over 60% of Sunpower's sales. Their share of Sunpower's customer base has diminished from 2003 mainly due to increased demand from the iron & steel industry. Currently, the customer base is spread relatively evenly between the petrochemical and iron & steel sectors. Management, however, believes that the petrochemical segment should regain a larger share due to the growing demand for its waste gas and energy recovery systems.

Projects that Sunpower bid for caters to both new expansion by its customers as well as ongoing replacement and upgrading needs. Sunpower takes advantage of its established relationships with core customers to add to its orderbook. Given its history of being built on research & development, Sunpower is focused on developing new products to fit the evolving needs of its customers.

PRODUCT DESCRIPTION

1. Heat Pipes

These are pipes that quickly and efficiently conduct heat from one point to another with little or no heat loss. Generally made of steel, aluminum or other metals, it uses in part capillary action with the heating of one end of the pipe warming up a proprietary liquid that transfers heat to the other end of the pipe.

2. Heat Pipe Exchangers

These consist of several heat pipes bundled together and used generally in energy recovery. The aim is for the heat exchanger to absorb excess heat emitted in an industrial furnace so that not all of it is expended into the atmosphere. The heat pipe exchanger may also help utilize this energy to heat other items.

3. Pipe Supports

Sunpower manufactures three patented types of pipe supports: 1) ultra low temperature cold insulating, 2) high efficiency heat insulating and 3) shock absorbing.

Cold insulating pipe supports are used for transporting materials that need to be kept cold such as Liquefied Natural Gas (LNG). At the same time the supports help ensure that the steel structure of the LNG container is not cooled by the LNG such that it cracks.

Heat insulating pipe supports are generally used to transport steam to turbines used for electricity generation. This ensures that steam does not cool and condensate prior to reaching the turbines increasing efficiency of the process and longevity of the turbines.

Shock absorbing pipe supports protect pipelines and connected equipment from vibrations caused during a transfer of materials at high pressure.

4. Pressure vessels

Unlike the heat pipes, heat pipe exchangers and pipe supports, Sunpower designs but does not manufacture pressure vessels. In this case, the production is subcontracted out to others. A pressure vessel is essentially the container or tank that holds and houses the heat exchangers and the fluid that is kept pressurized. Two examples of the required pressure vessels: corrosion resistant heat exchangers, which outlast normal heat exchangers in high-sulphur liquids such as sour crude, and high efficiency heat exchangers that produce a high quantum of heat with less space.

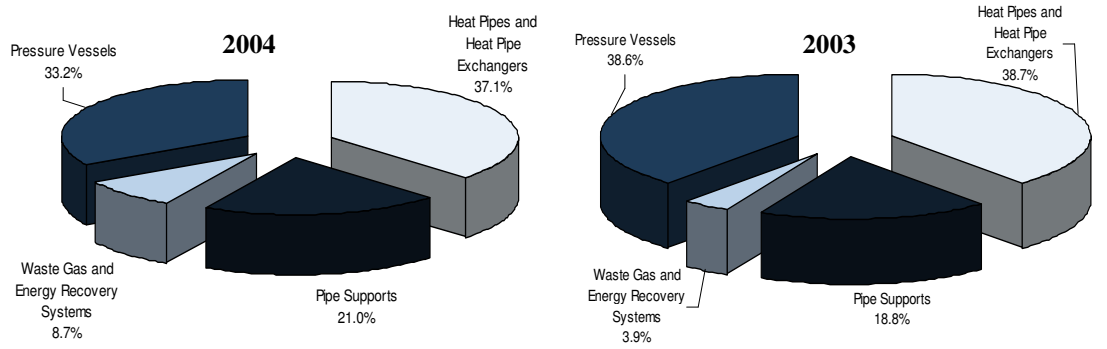
5. Waste gas & energy recovery systems

This is a system that enables residual heat and petrochemical by-products to be recycled and recovered from torch gas. Torch gas is waste gas generated during petrochemical refining and processing. Since torch gas is poisonous and highly heated, it is generally burned off. However, this causes pollution and is a waste of useful energy generated by its combustion. A number of industrial gases and/or liquefied petroleum gas can be recycled by Sunpower's system, which in turn helps to reduce the amount of pollutants released when the torch gas is eventually burnt.

BUSINESS MODEL

Sunpower currently derives the bulk of its revenue from heat pipes and heat pipe exchangers and pressure vessels, with increasing contributions from waste gas and energy recovery systems. Backed by its proprietary technologies and strong customer relationships, the group has evolved from the selling of products to a turnkey solution provider in energy saving and environmental protection, ranging from design, manufacturing, installation and commission to after-sale services. Apart from increasing order value, management believes solution-focused approach will strengthen its industry leadership, given that most of its domestic rivals are still at the stage of manufacturing and selling products.

EXHIBIT 2: REVENUE BREAKDOWN



Source: Company Data

A typical project is usually completed within half a year. Though the quick turnover help ease working capital requirements, it also lowers earnings visibility of the contract-based non-recurring business model due to a relatively short order pipeline. We believe most orders are normally signed during the year, the bulk of which does not carry over into the following year. Nevertheless, we note that about 80% of revenue (2003) was generated from repeat customers, though for different projects, thanks to its vigorous marketing efforts, solution-focused approach and quality products.

Sunpower prides in the wide applications of its products, essentially in any place that can lower energy consumptions using heat transfer technologies. This indicates bigger market potential, given China's strong desire to improve energy efficiency and reduce pollution. Management believes that continued strong demand from petrochemical and steel industries will provide Sunpower with a stable revenue base due to the sheer size and profitability of

these two industries. Whereas the penetrations into more industries are likely to be the growth catalysts, including the Qinghai-Tibet Railway and the coal liquefaction contract with China Shenhua Group.

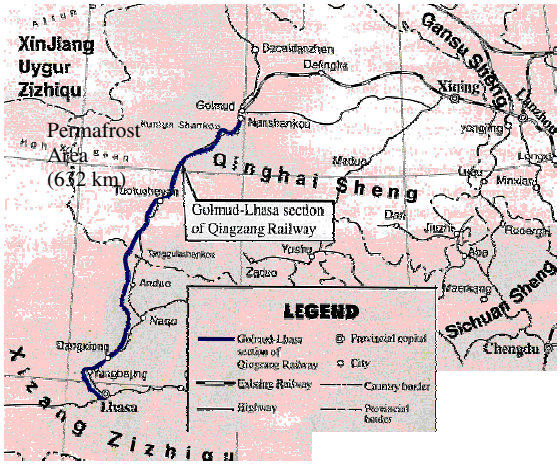
In terms of product segment, management expects heat pipes, waste gas and energy recovery systems and pressure vessels to be the major sources of growth. Listed below are some of the potential growth drivers of these three products. The pipe support segment is likely to see stable growth with more LNG terminals, power capacity and petrochemical plants under construction or in the planning.

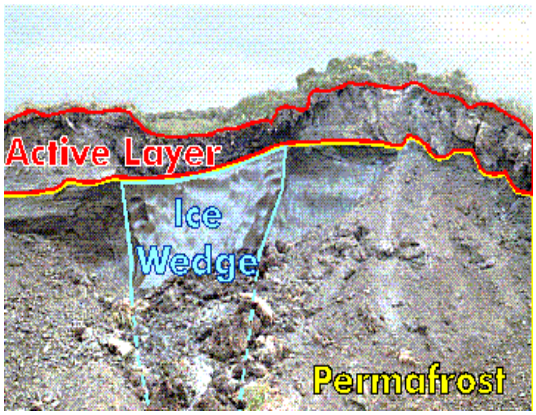
The Qinghai-Tibet Railway: Innovative Applications of Heat Pipes

With a total investment of CNY26.2 bln, construction of the 1,142-km Qinghai-Tibet Railway from Golmud in Qinghai province to Lhasa in Tibet started in 2001 and is scheduled to commence operation in 2007. Running at an elevation of over 4,000 meters above sea level, the highest railway in the world will cross 632 km of permafrost (perennially frozen ground), 550km of which is continuous permafrost. This presents considerable engineering problems caused by frost heave and thaw subsidence, which could threaten the stability of the railway foundation. As such, scientists believe the success of the construction and maintenance of the railway would depend on stabilizing the permafrost.

Permafrost refers to any rock or soil material that has remained below 0° C continuously for two or more years. This is to differentiate from the overlying ground surface layer or the active layer, which freezes in winter and thaws in summer. As shown in Exhibit 3, beneath the active layer and above the permafrost is the frozen earth, which is largely ice closest to the active layer. In certain areas, it is exclusively ice, and therefore sensitive to temperature changes in the active layer. When the active layer thaws, ice turns into water, causing the soil to collapse (thaw subsidence). When the active layer freezes, ice forms, pushing the ground surface upward (frost heave). As such, anything constructed on top of it will be moving up and down. Global warming has accelerated the erosion of the permafrost, which is now five to seven meters thinner than 20 years ago, according to recent research.

EXHIBIT 3: QINGHAI-TIBET RAILWAY AND PERMAFROST





Source: Tibetrail, About.com, S&P Equity Research

The core of the problem is maintaining heat stability of the frozen earth through reducing the amount of heat descending from the active layer. The Qinghai Tibet Railway is using a few means to cool and protect the soil, including insulating, shading, building bridges and "passive heat pumps" using heat pipes that conducts heat from the underground and circulates cold air. While the slab-stone insulation is the most widely applied method partly due to most cost

saving, heap pipes appear to be the most innovative approach taking into account the uniqueness of the permafrost in the Qinghai-Tibet Plateau.

The Qinghai-Tibet Plateau permafrost is considered as warm permafrost, which remains just below 0° C at around –4° C to -2° C, making it more susceptible to thermal disturbance. In contrast, the cold permafrost in Siberia and the Arctic may be as low as -12° C, which tolerates the introduction of considerable heat without thawing. Sunpower's specially designed heat pipes for the Qinghai-Tibet Railway transmits heat only one-way – from the permafrost to the ground surface. In winter, as the ground temperature is usually below -20° C, the underground permafrost loses heat to the environment through heat pipes, which could lower the permafrost temperature to -6° C to -8° C. When the ground temperature turns higher than that in the underground, the coldness accumulated in the permafrost can resist the heat from the ground such that the frozen earth remains frozen.

Sunpower successfully developed and produced the first batch of low temperature heat pipes for the Qinghai-Tibet Railway in Feb. 2003 and was subsequently invited by the railway's engineering headquarter to draft the standards for heat pipes used in the railway. Contracts for formal supplies are expected to sign soon, though it remains uncertain as to how many heat pipes will be ordered. In principle, every four meters along the track in the permafrost area will require a pair of heat pipes. Assuming that 250 km of the continuous permafrost area will use heat pipes, this could bring an estimated order book of CNY375 mln for Sunpower through 2008.

More importantly, we believe the Qinghai-Tibet Railway project demonstrates the group's technical leading position and the wide applications of heat pipes, which could potentially open up other opportunities such as high ways, pipelines, optical cables and grid towers that have to go through permafrost areas as China steps up infrastructure constructions in its vast west.

The CNY32 mln Coal Liquefaction Contract

Sunpower has signed a CNY32 mln coal liquefaction contract with China Shenhua Group, the largest coal producer in China to design, procure, manufacture, install and commission a waste gas and energy recovery system. Work on the project has started and is expected to complete by Aug. 2006. In terms of contract value, this is the largest contract that the group has secured to date. It also marks Sunpower's foray into the new field of coal liquefaction in China.

Coal liquefaction is the conversion of coal to refined oil after a series of processes in an environment of high pressure and temperature. This creates potential demand for Sunpower's products including pressure vessels, heat pipes and pipe supports, apart from waste gas and energy recovery systems. Operating commercial coal-liquefaction plants could be expensive, in our view, as the cost of liquefied-coal oil typically ranges from US$22 to US$28/bbl. However, given China's increasing oil supply shortage, the government hopes that coal liquefaction, as a strategic move, will help increase oil supply in the event that oil import slows down or oil prices continue to surge. It is anticipated that China will need to import half of its oil consumption by 2010 and the government reportedly is aiming for coal liquefaction to replace 10% of oil imports by 2013.

Shenhua reportedly is investing CNY60 bln to build China's first coal liquefaction project in Inner Mongolia, which is scheduled to start operation in 2007 with a designed annual capacity of 5 mln tons of oil products. We note that this is the only project that the Chinese government has approved so far. Although coal liquefaction promises to alleviate China's oil shortage, high potential risks including huge upfront investment are involved in its large-scale production, which prevent the launching of similar projects. Nevertheless, Shenhua is already planning to increase capacity to 30 mln tons by 2020 and a few other projects are being planned in the coal-rich provinces including Yunnan, Shanxi and Heilongjiang etc. Should coal liquefaction take off in China, Sunpower is likely to garner more orders for its products.

Waste Gas and Energy Recovery System: Killing Two Birds With One Stone

Feeling the pinch of energy crunch and environment degradation due to resource-centric mode of robust economic growth and low energy efficiency, China is striving to set up an energy-saving society through technological innovation and industrial structure optimization. The Chinese government believes the fundamental solutions to China's energy problem are making economical use a priority and a combination of developing new resources and energy saving mechanisms.

China is generally perceived as a world-class energy waster. Industry observers estimate that China spends three times the world average on energy and seven times what Japan spends to produce US$1 of GDP. For example, China's coking industry reportedly burns away more than 30 bln cubic meters of coal gas every year, as producers focus only on the production of coke while neglecting the potential economic benefits from recovering the waste gas. This equates to more than two times the designed capacity of the West-East Gas Pipeline.

Coal gas is the major by-product of coking. According to industry statistics, producing a ton of coke will result in 430 cubic meters of coal gas, about half of which is recycled to the oven to support combustion. The other half could be recovered through special devices for use as domestic gas and industrial fuel or to generate electricity and produce methanol. Alternatively, it will be released directly to the air or burned away liked torch gas, creating more pollution.

China's promotion of energy-saving techniques, cleaner production methods, establishing urban waste recycling and reducing the discharge of pollutants could spell strong market potential for Sunpower's waste gas and energy recovery systems. According to management, these systems boast a fast payback period of 6-12 months and save up to 10% energy costs apart from reducing pollution charges.

To illustrate, Sunpower has supplied four waste gas and energy recovery systems to Yangtze Petrochemical, a subsidiary of Sinopec. One such system costs about CNY40 mln. However, the residual heat and useful petrochemical by-products recovered could bring in net profit of approximately CNY26 mln per year, in addition to cutting annual maintenance cost by an estimated CNY15 mln and reducing pollution charges by about CNY6 mln. As a result, management believes the payback period in this case is only about 11 months, after which it should start to generate profits for Yangtze Petrochemical.

Pressure Vessels: Introducing Higher Value-added Products

Sunpower focuses mainly on corrosion resistant heat exchangers and high efficiency heat exchangers. While its current products using carbon steel are already more resistant to high temperature sulphur as compared to commonly used heat exchangers, Sunpower intends to introduce higher-grade pressure vessels using titanium to further improve temperature and corrosion resistance. These will be used in the petrochemical, medical and rare metal industries. While continuing to outsource the production of carbon steel pressure vessels, Sunpower will use part of the expanded capacity in Nanjing to manufacture the titanium pressure vessels.

Management estimates that the pressure vessels market in China amounts to a few hundred million yuan per year, whereas the company's revenue from pressure vessels in 2004 was only around CNY60 mln. Management is confident of the growth prospect for pressure vessels, driven by the wide applications, the introduction of higher value-added products and the replacement needs given the typical life span of two to five years for normal pressure vessels.

MANAGEMENT

Sunpower was founded in 1997 following the successful commercialization of specialized pipe supports for Sinopec Yangtze Petrochemical. Sunpower's Chairman, Mr. Guo Hong Xin and Executive Director Mr. Li Lai Suo were instrumental in leading the development and commercialization of the pipe supports. Both men previously held key positions with the Research Institute of Nanjing University of Technology.

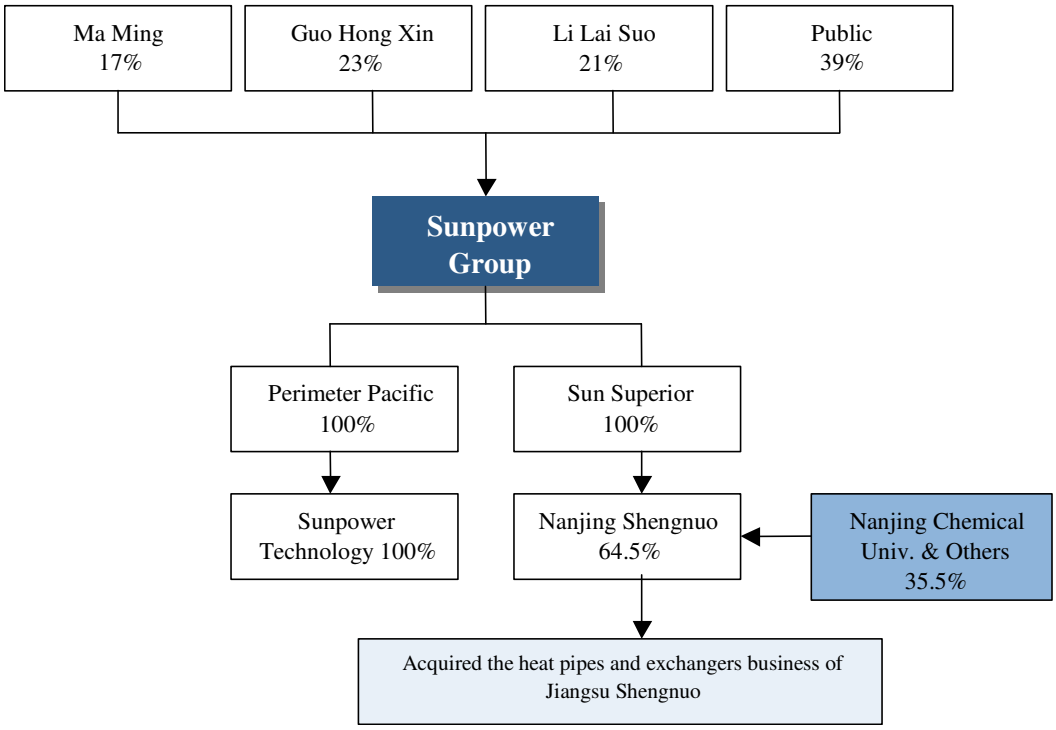
Given their research background, Mr. Guo and Mr. Li have maintained close research relationships with the Nanjing University of Technology as well as other Jiangsu based institutions. The two men are joined by Mr. Ma Ming who brings practical experience from his background as an engineer and manager at various chemical and industrial companies.

EXHIBIT 4: IPO PROCEEDS:

	S$ mln
Amount Raised	10.8
Used as follows:	
New equipment	4.5
Research & Development	1.7
Business development	1.0
Working Capital	1.2
Total for Sunpower use:	**8.4**
Listing Fees	2.4
	10.8

Source: Company data

EXHIBIT 5: SHAREHOLDING AND COMPANY STRUCTURE



Source: Company Data, S&P Equity Research

CORPORATE GOVERNANCE

We view positively Sunpower's Board of Directors (BoD) being dominated by independent directors - four versus three – and its audit and nominating committees consist only of independent directors. This is diminished somewhat by its remuneration committee that is not entirely independent with no apparent segregation of the chairman and CEO roles. On the whole, we believe its BoD structure is fair for Singapore listed companies. The following issues are also worth noting:

- Related party transaction: Sunpower's major shareholders, chairman Mr. Guo and executive directors Mr. Li and Mr. Ma, are also shareholders and executives of Sunpower Petrochemical, which has leased buildings to Sunpower. The rent is based on independent valuation.
- Conflicts of interest: Mr. Guo, Mr. Li and Mr. Ma have interests in Sunpower Petrochemical and Jiangsu Shengnuo; both of which were previously competitors to Sunpower's business. In so far that the three remain substantial shareholders and executives of the companies, non-competitive undertakings have been provided. While Sunpower Petrochemical has changed its business license to exclude activities undertaken by the group, we note that Jiangsu Shengnuo will not engage in the business of heat pipes and related products after June 2005.
- Service Agreements and Performance bonus: a three-year service agreement has been entered into with Mr. Guo, Mr. Li and Mr. Ma. Additionally the three are entitled to a performance bonus based on the pretax profit (PBT) performance of Sunpower. For PBT between CNY42 mln and CNY45 mln, bonus for each is 2% of PBT and for PBT above CNY45 mln, bonus for each is 3.33% of PBT.

MANAGEMENT STRATEGY

As a technology-based company, we believe Sunpower's main challenge is to sustain the current high profit margin as technology proliferation and increased competition drive down existing products to more mature stages of lower profit margins. The introduction of new technologies and new industry standards may render the group's existing technical solutions and products obsolete and unmarketable. As such, we believe Sunpower's future success is ultimately dependent on constant innovations in technologies and expanding into new, higher value-added products riding the evolution of its customers' demand.

There appears to be some sort of strategic fit, as management strategy is centered on product development through more vigorous R&D efforts. This will be supplemented by production capacity expansion, market development, potential acquisitions and strategic investments or alliance.

1) STRENGTHEN R&D CAPABILITIES AND INCREASE PRODUCT RANGE

Sunpower focuses on application R&D, developing systematic solutions to common problems faced by its customers by leveraging on its technical capabilities and industry expertise. This ensures higher success rates, wider applications and higher returns for its R&D results. The group also ties up with established universities, including Nanjing University of Technology, South East University of China and Jiangsu Polytechnic University, to jointly research on various environmental protection and energy saving products.

In particular, Nanjing University of Technology has been appointed by the Ministry of Science and Technology as the Heat Pipe Technology Promotion Center since 1994. Its R&D could benefit Najing Shengnuo, a JV between Sunpower and a subsidiary of the university. The group currently owns 11 patents registered in China and is conducting three more R&D projects including one for waste gas and energy recovery systems. As an evidence of its technical leading position, the group drafted the standard for the heat pipes used in the Qinghai-Tibet railway to prevent the melting of the permafrost.

With increased competition, the group will continue to strengthen its R&D capabilities through more investments in advanced technology, hiring talented staff to augment the knowledge of its existing team, and increasing its joint R&D efforts with universities. Management believes this will enable the group to expand its product range offerings in response to the evolving demands of customers and improve its production process efficiency.

EXHIBIT 6: SUNPOWER'S PATENTS (TOTAL: 11)

Products	Patents	Description
Heat Pipes	1	Low-temperature Thermal Stick with Central Testing Pipe
Heat Pipe Exchangers	3	High Efficient Thread Pipe Exchanger
		Mid-high Temperature Separated Heat Pipe Exchanger
		Continuous Abundant Oxygen Gas Generating Skills Gas Cooler
Pipe Supports	3	High-temperature Heat-insulated Support
		Super Low-temperature Cold-insulated Support
		High-pressure, Super High-pressure Damping Support
Pressure Vessels	4	High Efficient Corrugate Pipe Condensator
		High Efficient Corrugate Pipe Reboiler
		High Efficient Heat Flux Exchanger
		High Efficient T Type Thread Pipe Exchanger

Source: Company Data

2) EXPAND PRODUCTION CAPACITY

Operating at close to full capacity, the group intends to expand its manufacturing facility in Nanjing to meet the anticipated increase in market demand. Sunpower generally manufactures products and components related to its proprietary technologies to ensure confidentiality, but outsource other products and components to sub-contractors. About 54% or S$5.4 mln of the IPO net proceeds will fund the purchase of machinery and the leasing of factories.

3) DEVELOP NEW MARKETS

Domestically, Sunpower is intensifying its marketing efforts to push into new industrial sections that have yet to use its products and solutions. While China offers vast business opportunities, management thinks overseas expansion is vital to the group's sustained growth and brand-building. Management believes low cost manufacturing and leading technical position will enable the group to compete effectively on the international market.

4) ACQUISITIONS, JOINT VENTURES OR STRATEGIC INVESTMENTS

Management keeps a constant lookout for synergistic businesses and intends to bolster Sunpower's growth potential through acquisitions and other avenues such as strategic investments, alliances or JVs.

EARNINGS TREND AND OUTLOOK

Sunpower's proforma historical earnings trend over the past four years (2001-2004) has been volatile reflecting its nascent business history. Sunpower recorded strong revenue growth from CNY44.1 mln in 2001 to CNY200.7 mln in 2004, positing strong gains across all four of its product categories. Gross profit margins however fluctuated widely from 20.8% in 2001, declining to 17.5% in 2002 before recovering to 28.8% in 2003 and 35.0% in 2004.

The dip in margins in 2002 was attributed by the company to lower profits at its heat pipes and heat pipe exchangers segment as a result of launching a new product (working fluid heat pipes) at competitive prices to gain market share and due to strong competition from Jiangsu Shengnuo. Margins improved in 2003 as competition eased off following the commencement of negotiations to take over Jiangsu Shengnuo in March 2003. Its 2004 margins improved further as price increases instituted in 2H2003 worked through the full financial year.

Sunpower currently enjoys an order book of CNY151 mln. After taking into account that petrochemical industry demand tracks GDP growth by a factor of 1.5x, driven by the government's efforts to achieve a greater degree of import substitution, combined with the continued buoyant demand in the iron and steel industries, we are cautiously confident that Sunpower will be able to grow 2005 and 2006 revenues by 35% and 48% respectively. Revenues over the next four years will be significantly enhanced by the supply of heat pipes for the Qinghai-Tibet railway project. We estimate that as much as CNY375 mln of heat pipes will be required between 2005-2008.

In addition, the waste gas and energy recovery systems division will be an increasingly important segment for Sunpower due to environmental issues and the need for better energy conservation. It is currently estimated that less than 10% of petrochemical plants have waste gas systems installed. Management is quietly confident of the prospects in this market segment. Sunpower announced in April 2005, a CNY32 mln contract with China Shenhua Group to design, procure, manufacture, install and commission a torch gas and torch gas recovery system. More of such contracts should be forthcoming as environmental concerns gain traction.

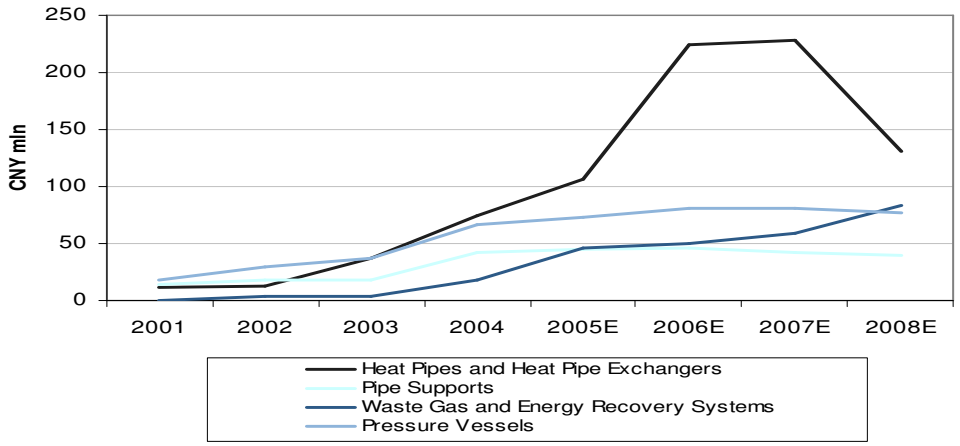
However to reflect our expectations of a cyclical downturn in the petrochemical and iron and steel industries, we have assumed revenue growth of just 2% in 2007 and contraction of 19% in 2008. In fact 2007 would have seen some revenue contractions were it not for heat pipe revenues from sales to the Qinghai-Tibet railway project which runs till 2008. We expect that the difficult economic environment during 2007 and 2008 will have a negative impact on gross profit margins (declining to 28.6% and 28.3% respectively) as pricing and competitive pressures take its toll.

EXHIBIT 7: KEY ASSUMPTIONS

FY Dec. / CNY mln	2004	2005F	2006F	2007F
Turnover				
Heat Pipes and Heat Pipe Exchangers				
- Qinghai-Tibet Railway	-	28.1	138.8	151.1
- Others	74.5	78.2	86.0	77.4
Pipe Supports	42.2	44.3	46.5	41.9
Waste Gas and Energy Recovery Systems				
- China Shenhua Coal	-	20.0	12.0	-
- Others	17.5	26.3	37.4	59.1
Pressure Vessels	66.5	73.2	80.5	80.5
Total Revenue	*200.7*	*270.1*	*401.2*	*410.0*
Gross Profit	70.2	95.6	143.8	117.4
Gross Profit margin	35.0%	35.4%	35.8%	28.6%

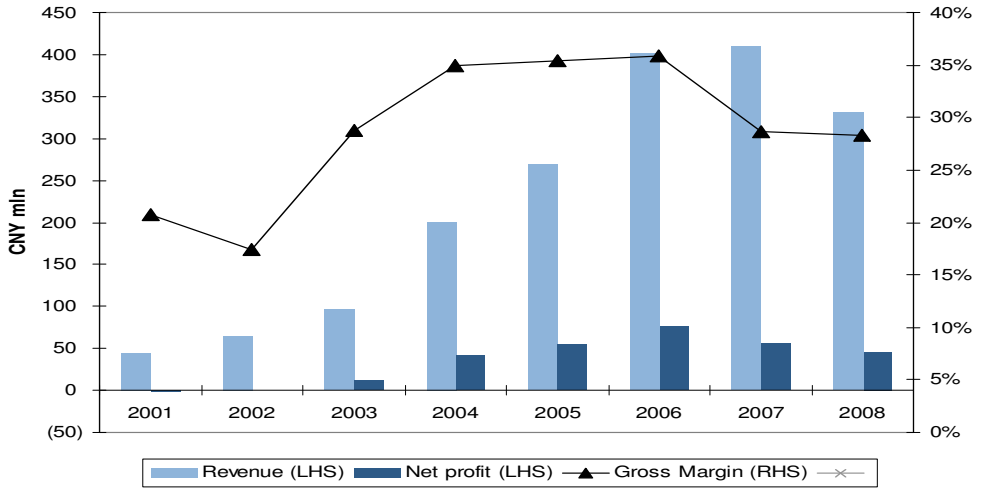
Source: Company Data, S&P Equity Research

EXHIBIT 8: REVENUE TREND BY PRODUCT SEGMENT



Source: Company Data, S&P Equity Research

EXHIBIT 9: REVENUE AND PROFITABILITY (2001-2008F)



Source: Company data, S&P Equity Research

EARNINGS QUALITY

Sunpower's intellectual capacity in providing customized solutions and the practice of sub-contracting out a significant portion of assembly tasks to third party component manufacturers mean that Sunpower does not have to incur significant expenditures to ramp up production capacity. As such Sunpower is able to enjoy a high degree of operating leverage that allows the Group to withstand future downturn in their business.

Sunpower also produces certain categories of pressure vessels, which are used in a high corrosion environment within the oil and gas industry. With a typical lifespan of between two to five years, there will be demand for replacements.

On the other hand, there is a distinct lack of earnings visibility given that the bulk of Sunpower's revenues are generated on a contact-by-contract basis. An absence of any long-term supply deals mean that there could be an element of volatility to revenues as there is no assurance that management can continue to successfully secure new projects. Having said that, we note that 80% of 2003 revenues were from repeat customers.

Sunpower is also highly dependent upon key customers in the petrochemical and iron and steel industries. To date, Sunpower has not experienced any serious bad debt problems, but its business may be vulnerable to a cyclical downturn in these industries and exposing it to the risk of bad debts and collection problems that could seriously impact its cash flow. Sinopec and CNPC together contributed 49% of Sunpower's 2003 revenues.

Moreover, given that the bulk (70%-90%) of the contract sum is only collected upon the delivery, installation and commissioning, Sunpower will likely have to fund much of the construction and installation costs over the typical two- to five-month contract period. While some of these costs are defrayed by credit terms received from its assembly subcontractors, Sunpower may be vulnerable to any changes in the credit terms received.

We believe the intellectual and technical expertise is the key barriers to entry, hence its ability to retain key technical personnel will also be critical to Sunpower's long-term success.

Overall, we consider Sunpower's earnings transparency and stability to be only low to moderate owing to the absence of a contractual recurring earnings stream. In this respect the forward projections of Sunpower's revenues were particularly onerous.

VALUATION

S&P Equity Research has derived a S$0.34/share valuation for Sunpower from a combination of intrinsic (DCF – discounted cash flow) and relative (PER - price to earnings ratio) valuation methodologies.

EXHIBIT 10: SUNPOWER VALUATION SUMMARY

Intrinsic valuation	S$0.28
Relative valuation	
2005 Peer's simple average PER	12.1 x
2005 Sunpower EPS	S$0.033
	$0.39
Valuation	**$0.34**

Source: S&P Equity Research

INTRINSIC VALUATION

We consider the DCF valuation methodology to be the most appropriate for appraising companies with stable growth rates and low earnings volatility. While there are some limitations to DCF when applied to growth companies given the sensitivity of the estimated fair value to key assumptions used in estimated long term future cash flows, we continue to favor the use of DCF to estimate the intrinsic value of the company as it enables the incorporation of visible and quantifiable factors.

We have ascribed a beta of 1.18x derived from the average beta of key companies in the petrochemical and iron & steel industries in the absence of direct comparables. The bulk of Sunpower's revenues are derived from customers from these 2 industries in equal measure and therefore we view this as an appropriate measure. The risk free rate of 5% considers the PRC's long-term sovereign bond yield.

EXHIBIT 11: ASCRIBED BETA

Company	Bloomberg code	Adjusted Beta
Sinopec Shanghai Petrochemical	338 HK Equity	1.13
Sinopec Beijing Yanhua	325 HK Equity	1.18
Sinopec Zhenhai Refining	1128 HK Equity	1.13
Angang New Steel	347 HK Equity	1.21
Maanshan Iron & Steel	323 HK Equity	1.24
Chong Qing Iron & Steel	1053 HK Equity	1.22
Simple average		**1.18**

Source: Bloomberg

Our DCF valuation is based upon the free cash flows derived from explicit forecasts for Sunpower from 2005 to 2010. For periods thereafter, we have assumed a 3% terminal growth, which we consider to be reasonable given the long-term growth potential of the PRC economy. Forecast operating free cash flows for 2005-2010 are discounted at the weighted average cost of capital (WACC) of 13.67% (reflecting its equity funding bias) and aggregated together with the present value of the terminal value. We derive the enterprise value for Sunpower amounting to CNY523 mln. Excluding debt and minority interests, we estimate the intrinsic value of the company at CNY469 mln or S$0.28 per share.

EXHIBIT 12: DCF VALUATION PARAMETERS AND INTRINSIC VALUE

Terminal Growth	3.0%
WACC	13.7%
Cost of Equity	13.9%
Cost of Debt	5.7%
Risk-Free Rate	5.0%
Beta	1.18
Equity Risk Premium	7.6%
Enterprise Value (CNY mln)	522.8
Net Debt (CNY mln)	(9.4)
Minority Interest (CNY mln)	(44.7)
Intrinsic Value (CNY mln)	468.7
Intrinsic Value (S$/share)	S$0.28
Issued Shares (mln)	329
S$:CNY Exchange Rate	5.00

Source: S&P Equity Research

RELATIVE VALUATION

To complement our use of DCF, we applied the more commonly used relative PER method. Given Sunpower's niche product range, there is only one other direct comparable listed in Singapore, namely Devotion Eco-Thermal Ltd which develops and fabricates energy saving and environmentally friendly thermal equipment.

We have proceeded to compile several Asian companies listed in various bourses operating in similar businesses for benchmarking purposes. Despite its industry and business relevance, we have excluded Devotion's abnormally low PER values to avoid skewing the data to obtain a simple average 2005 PER of 12.1x and applying it to Sunpower's 2005 EPS of S$0.033 we obtain a PER relative valuation of S$0.39

The disparity between the intrinsic and relative valuations reflects both the conservative assumptions factored into our cash flow model and our assumptions that the key petrochemical and iron and steel industries are near the top of their industry cycle.

Taking the average of the two valuations, we derive our valuation of S$0.34/share, giving Sunpower a 2005 implied PER of 10.3x. While this translates into a sharp 26% discount to the 2005 SGX market PER of about 14x, it compares favorably to the 2005 PER range of its regional peers of between 2.8x and 22.8x and is not unreasonable in our view, considering China's business risks, our expectations of an imminent cyclical slowdown in the key petrochemical and iron and steel industries and the absence of a dividend payment policy.

EXHIBIT 13: RELATIVE VALUATION ANALYSIS (AS AT MAY 31, 2005)

	Chugai Ro Co.*	Devotion Eco-Thermal Ltd	Kenertec Co. Ltd.	Samyoung Corporation	Simple Average#
Bloomberg Code	1964 JP	DET SP	062730 KS	036530 KS	
Currency	JPY	S$	KRW	KRW	
Share Price	265	0.10	9250	15850	
Market Capitalization (US$)	232.7	10.5	99.8	116.8	
FY	Mar.	Dec.	Dec.	Dec.	
2004 PER	14.8	5.8	21.7	6.8	14.5
2005 PER	22.3	2.8	6.4	7.5	12.1
2006 PER	31.5	2.3	4.3	6.2	14.0

Excluding Devotion
* Calenderized

Source: IBES, Reuters Estimates, S&P Equity Research

MAJOR RISKS

Order Book Deviations

Sunpower's disclosed order book as at end-April 2005 is CNY151 mln. We believe the group is poised to win more orders, capitalizing on China's emphasis for energy saving amid increasing supply shortage and rising costs. However, the quick turnover nature of projects lowers earnings visibility of its contract-based non-recurring business model. As such, there is a high possibility that the actual order book might deviate from what we have assumed. In particular, we have factored in CNY375 mln from the Qinghai-Tibet Railway between 2005-2008. Failure to obtain the contract, delays in awarding the contract and/or deviations in the contract amount could significantly impact our earnings forecasts.

Margin Fluctuations

The raw materials for Sunpower's products are steel plates and steel pipes, accounting for about 75% of cost of sales in 1H04. As such, we believe Sunpower is exposed to the steel price cycle. We note that gross margin fluctuate between 17-35% from 2001 to 2004, though partly due to pricing strategy amid product launch and intensified competition. The pricing of Sunpower's products is determined based on contract requirements including the type and quantity of materials used, labor costs, product type and dimension. Hence, there is no standard pricing.

Project Risks

Sunpower could be subjected to certain project risks including (1) Delay in completion of projects and unanticipated termination of projects; (2) Failure to secure new contracts, termination or reduction of the scope of existing contracts; and (3) Project cost overruns which could impact adversely on margins and operations.

Tax Regime Changes

The group's major operating entities, Sunpower Technology and Nanjing Shengnuo, pay a reduced income tax rate of 15% after its tax holiday of two-year exemption and three-year 50% reduction ends in 2008. China reportedly plans to unify income tax for foreign investment enterprise (FIEs) and domestic enterprises. The unified tax rate is estimated at around 25%. However, it is uncertain whether the new measures, when introduced, will seek to cancel all or any unexpired tax incentives, or whether they will only cease granting tax incentives to newly established FIEs.

High Dependence On Core Customers

The Sinopec group and CNPC group accounted for an aggregate of about 54% of 1H04 revenue, though down from 70% in 2001. In the event of a reduction or cancellation of orders from these two major customers, the group's business and financial position could be adversely affected.

Credit Risk

As at end-2004, trade receivables accounted for about 60% of current assets and 36.1% of revenue. Sunpower's credit terms generally vary from 30 to 90 days and 5-10% of total contract sum is collectible only one year after the completion of contracts. Although to date, Sunpower has not experienced any serious bad debt problems, we do not rule out higher working capital requirements in the event of an increase in receivables during a cyclical downturn in end-use industries. We note that Sunpower has a negative operating cash flow in 2003, partly due to increase in receivables.

Technology Obsolescence

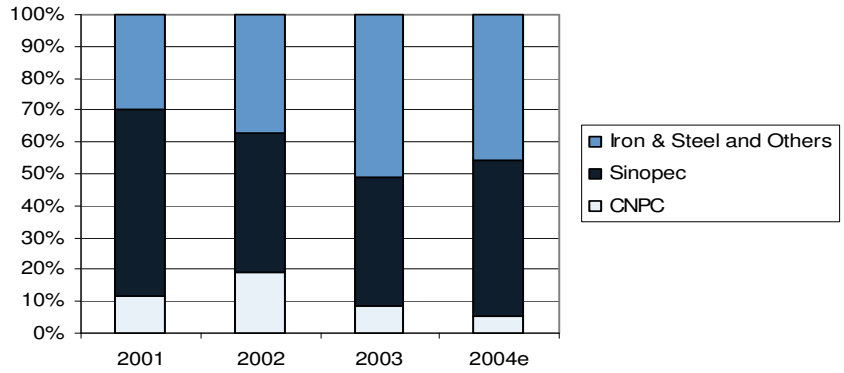
The life cycle of Sunpower's leading technical solutions is difficult to estimate. The introduction of new technologies and new industry standards may render the group's existing technical solutions and products obsolete and unmarketable. Sunpower's business depends on some intellectual property rights (IPRs) that could be infringed due to relatively weak IPRs in China.

INDUSTRY OVERVIEW & DYNAMICS

Sunpower provides specialized products primarily to the petrochemical and steel industries. Demand for its products therefore mirrors the development of these sectors in China. We see the drivers of Sunpower's business coming from (1) China's sustained high GDP growth resulting in continued need for resources and materials; (2) increased government pressure for greater efficiency in energy recovery; and (3) a desire to reduce pollution. The petrochemical sector however is likely to be prone to price and asset investment cycles and this may impact Sunpower's orderbook from time to time. The company has sold products to Russia but we believe that this is on an opportunistic basis and is not part of its core strategy.

On the whole, however, the portion of spending on such products by the energy and materials sectors is relatively small. While Sinopec and PetroChina spent over CNY160 bln in capital expenditure in 2004, Sunpower's 2004 revenue was CNY200 mln, of which around half were related to sales to the energy and petrochemicals industries. Hence, while exact data is unavailable, we believe that Sunpower's product market is currently relatively small.

EXHIBIT 14: SUNPOWER CUSTOMER BASE

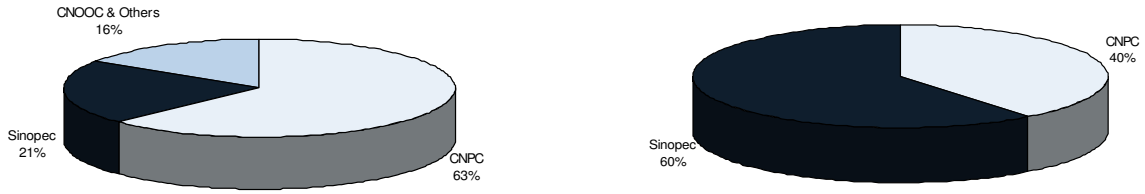


Source: Company data

OVERVIEW OF ENERGY AND PETROCHEMICALS INDUSTRY

China's oil & gas sector is dominated by its three state-owned integrated oil & gas entities, namely CNPC, Sinopec and CNOOC. Downstream activity is essentially a duopoly with CNPC and Sinopec controlling refining and marketing and with the latter having a significant share of the petrochemical market. Since Sunpower builds up its orderbook of contracts through an established relationship with customers, particularly the oil & gas entities and petrochemical manufacturers, its clientele consists largely from CNPC and the Sinopec group.

EXHIBIT 15: MARKET SHARES - CRUDE OUTPUT (YR TO 28 FEB.) **OIL PRODUCT SALES (EST. 2004)**



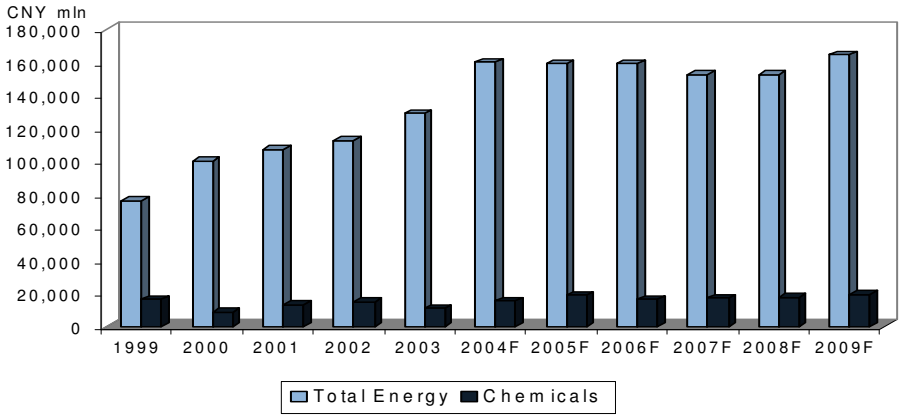
Source: Xinhua, Sinopec, PetroChina

Sinopec controls China's petrochemical production although its market share is probably lower at around 20%-40% depending on the product. This is due to more foreign companies in this segment and more sizeable imports. As such, the government policy has been to encourage import substitution through more aggressive domestic plant investment. Unlike oil products where pricing is subject to government guidelines, petrochemical pricing is open given its reliance on imports. In our view, this forces Sinopec and CNPC to consider global price and demand cycles when planning for expansion.

Given the long lead time to build a petrochemical plant, however, the sector is prone to periods of excess capacity. We believe that this may impact petrochemical segment expansion in post-2006 given current expectations for petrochemical prices to ease in 2007. Hence despite the strong growth in China's petrochemical demand at 13%-20% CAGR (historically 1.5x-2x GDP growth), we would anticipate capital expenditure growth in this segment to ease in 2007 and 2008. So while be believe that Sinopec's and CNPC's investment in this segment should grow at an average 10% annually, we believe this is unlikely and there may be periods of reduced spending.

In addition oil prices have been exceptionally firm in recent years, allowing Sinopec and CNPC greater flexibility in their spending. As crude prices peak, we believe that management is likely to be more conservative with its budget and are largely factoring to reduce capital expenditure post-2006. Since the companies determine their budgets at year-end and only for the next year, we may see continued adjustments. This is likely to add some visibility issues to Sunpower's orderbook although we suspect that deviations can be partially made up by an increased attention to tools and systems that will help aid energy recovery and efficiency.

EXHIBIT 16: SINOPEC AND PETROCHINA CAPITAL EXPENDITURE (1999 – 2009F)



Source: Sinopec, PetroChina, S&P Equity Research

Another issue that could impact demand for Sunpower's products in the energy sector is the emphasis by CNPC and Sinopec to explore new oil and gas reserves. This is likely to dominate the companies' investment and is marked by a rising trend to seek reserves outside China given the limited resources in the mainland. While this augurs well for Sunpower's waste gas and energy recovery systems on the domestic front, it also means that the company may not benefit from rising expenditure outside China.

Energy and Environmental Policies Underscore Potentials for Sunpower's Products

In our view there is good potential demand for Sunpower's products including waste gas and energy recovery systems due in large part to the government's encouragement for more efficient energy and a cleaner environment. In the current Five-year Plan (2001-2005), marking the first time that energy security was included as a central issue in China's energy policy, measures being pursued include an increase in the share of cleaner energy sources, diversification of energy sources, energy conservation and stronger environmental protection.

According to the government's blueprint, the energy consumption for every CNY10,000 GDP is expected to drop by 16% from 2.68 tons of coal equivalent in 2002 to 2.25 tons in 2010. Energy consumption efficiency of major industrial products, such as steel, aluminum and electricity is targeted to reach the level of developed countries in the early 1990s. China reportedly has budgeted CNY1.3 trillion for environmental protection in 2006-2010, twice the amount allocated for the previous five-year period.

Pressing reasons for more effective environmental protection and higher energy efficiency include:

- Relying on coal for about 70% of its primary energy consumption, China spews out about 22 mln tons of sulphur dioxide a year, double that of the U.S. Chinese cities are among the world's smoggiest and most of the waterways are severely polluted with sewage and industrial effluent. Acid rain covers around 30% of the country's area, with direct and indirect damage up to 3-5% of GDP.
- Despite growing recognition of the dire costs to the environment from China's industrial boom, heavy polluters continue to foul the water and air due to poor enforcement of restrictions at the local levels.
- China spends three times the world average on energy and seven times what Japan spends to produce US$1 of GDP. The World Bank estimates that inefficient fuel use is costing China more than US$120 bln a year in lost industrial output and health costs related to pollution.
- Government officials worry that energy shortage and increasing imports would become a bottleneck hindering economic growth and a threat to the environment and to national security.

One of the immediate outcomes of these measures has been the push to develop the use of natural gas in China. This has benefited and should continue to drive demand for Sunpower's products in regards to the transportation of natural gas and LNG. The most visible related project being the CNY45 bln West-East Gas Pipeline project. We note that plans to add more regional pipelines remain core to China's energy policy with CNPC likely to have built 12,000 km of pipelines between 2001-2005, and targeting to add 9,000 km in 2006-2010 and 11,000 km in 2011-2015.

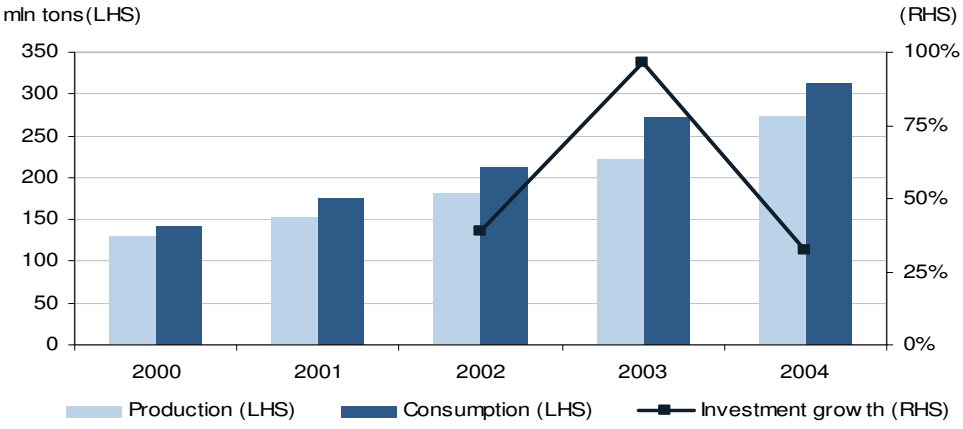
In addition, the Chinese government is gradually raising the environmental policies for various industries as marked by the enforcement for petrol to be lower in sulphur content last year. We believe that petrochemical companies are likely to be forced to spend more in the future to improve energy efficiency from both an economic and regulatory standpoint.

OVERVIEW OF STEEL INDUSTRY

More curbs on surging investment

China is the largest steel producer and consumer in the world. Driven by its resource-centric model of robust economic growth, steel consumption in China rose rapidly at a CAGR of 22% to approximately 312 mln tons in 2004 from about 142 mln tons in 2000. Attracted by the surging demand, investment in the steel industry expanded at a frantic pace of 97% in 2003 and accelerated to 173% in the first two months of 2004. Consequently, the steel industry is singled out by the central government as one of the major targets for the ongoing macro-economic control measures.

EXHIBIT 17: CHINA'S STEEL DEMAND, SUPPLY AND INVESTMENT



Source: National Bureau of Statistics, China ISA, S&P Equity Research

Although steel investment growth has since slowed down to 32% in 2004 due to credit tightening and stricter land control, the central government worries about a rebound and appears determined to halt the blind expansion in steel production capacity, in line with recent drives to protect the environment and conserve resources and energy. To cash in on the rising steel prices, many small steel makers and non-steel investors are building low-end steel mills due to low technology and investment requirements.

The capacity currently under construction is estimated at around 150 mln tons, which could increase China's steel production capacity by more than 40% in these two years. Management estimates that the building of 500,000 tons of iron capacity would require about CNY1.5-2.0 mln of heat pipes. This implies an estimated market size of approximately CNY675-900 mln of heat pipes, excluding replacement and upgrading requirements.

China has many inefficient steel plants

Massive low-end steel capacity results in high raw material wastages, serious pollution and heightened fluctuations in the steel market. While some steel makers, such as Baosteel Group, boast modern facilities, many others are still relying on decades-old coal-fired blast furnaces, belching out large amount of dust and contaminants every year. Chinese steel makers on average use about twice as much energy as Japanese or Korean rivals per ton of output.

Changing landscape amid policy changes and reshuffle

Many observers believe the 71.5% surge in imported iron ore prices provides a good opportunity for China to restructure the overheated and fragmented steel industry. Of the 2,000 steel producers in China, only 15 companies produce more than 5 mln tons a year, accounting for about 45% of total output. Fragmentation is generally believed to be an important reason for the overheating investment in the steel industry. Industrial officials

believe a shakeup is badly needed to improve international competitiveness. The government is targeting for the top 10 steel makers to control above 80% of output.

In a bid to reduce iron ore imports to prevent inflating property prices, the government has recently decided to scrap the 13% export tax rebate for low-end steel billet and ingot products with effect from 1 Apr. 2005. This will inevitably increase domestic supply, adding to the potential supply glut, particularly in the low-end segment. With production outpacing demand, China is tipped to become a net steel exporter this year. The reduced export and margin squeeze from iron ore price hike and increased competition could see profit decline for the steel industry, in particular, those small and medium steel makers.

The changing landscape in the steel industry could imply some uncertainties for suppliers and customers, as restructuring weeds out the weaker players. Nevertheless, restructuring also provides opportunities for the established and savvy players to expand market shares through both acquisitions and greenfield expansions. While the pace of investment looks set to further slow down reflecting the cyclical nature of the industry, we believe capacity expansion could remain robust in the these two years due to the carryover effect of past investments. Further more, there could be constant replacement of existing facilities from routine overhaul and relocation of plants.

SWOT ANALYSIS

Strengths

1. **Established relationships with customers.** Having been formed out of a relationship with the Sinopec group, Sunpower remains committed to meeting the needs of several of Sinopec's petrochemical arms. This loyalty and close relationship is likely to augur well for Sunpower given cultural priorities.

2. **Research & Development orientated focus.** The familiarity and comfort in using research & development to innovate to meet customer needs reflects well for Sunpower and can provide the company greater product flexibility and potentially integrated solutions over competitors.

3. **Experienced management with firm understanding of product and needs.** Given the technical background of the three founders, Sunpower's management should be able to understand the needs of customers and proactively devise new products in line with demand trend. The ability to commercialize on research & development is proven.

Weaknesses

1. **Customer concentration is high.** The Sinopec group at almost half of Sunpower's estimated 2004 revenue dominates Sunpower's customer base. This leads to greater risk given high dependence on the fortune and spending of one group and the potential for limited pricing power.

2. **Exposure to cyclical industries is high.** Sunpower's customers are involved primarily in petrochemicals and iron & steel. Both are commodity industries subject to price cycles that may result in capital expenditure fluctuation. Sunpower has traditionally mitigated this variance by providing for the customers' upgrading needs but we believe that this may not always compensate in terms of growth.

3. **Exposure to base metal price volatility.** Since the bulk of Sunpower's costs stem from raw materials, which are made from base metals such as steel and aluminum, the company is subject to base metal price cycles. If the company is unable to pass on rising raw material prices, there is a risk of a margin squeeze.

Opportunities

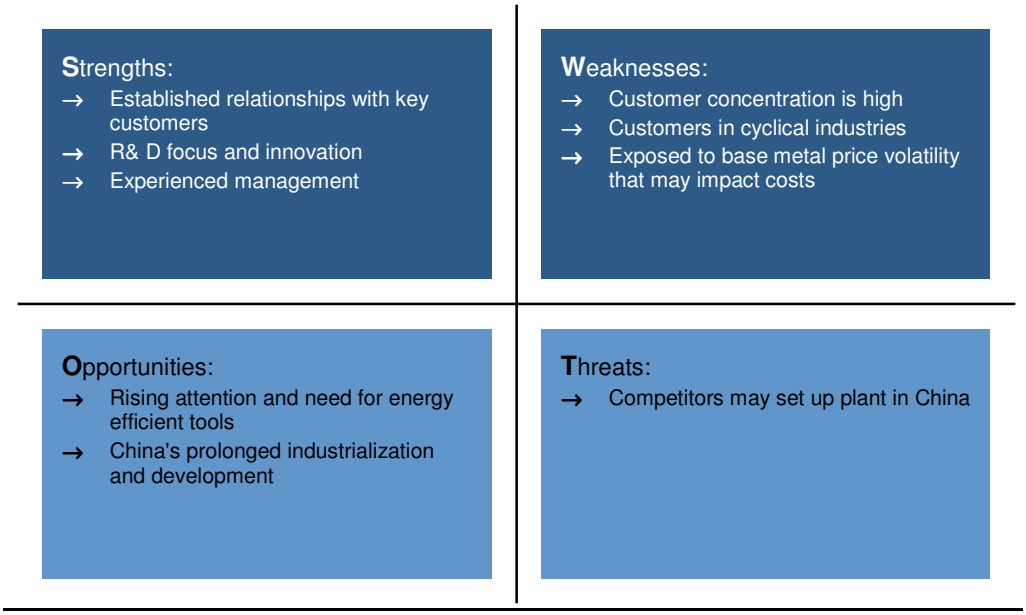
1. **Rising need for more energy efficient solutions.** With China's energy consumption anticipated to double by 2030 and the World Bank estimate than US$120 bln was lost on inefficient energy use and pollution related costs, we believe that the government is likely to implement increasing measures to encourage companies to be more energy efficient and less polluting. Many companies themselves may be keen to invest in such systems given the heightened awareness of rising energy costs.

2. **Positive long-term macro prospects.** China is likely to see a prolonged period of industrialization and relatively high GDP growth of 7%. This augurs well for Sunpower's products.

Threats

1. **Competitors may set up plants in China.** At this stage, competitors are largely local companies but we believe that as the market grows and as CNPC and Sinopec increase spending offshore and establish relationships with non-Chinese companies there is a growing threat that foreign competitors may set foot in China.

EXHIBIT 18: SWOT ANALYSIS



Source: S&P Equity Research

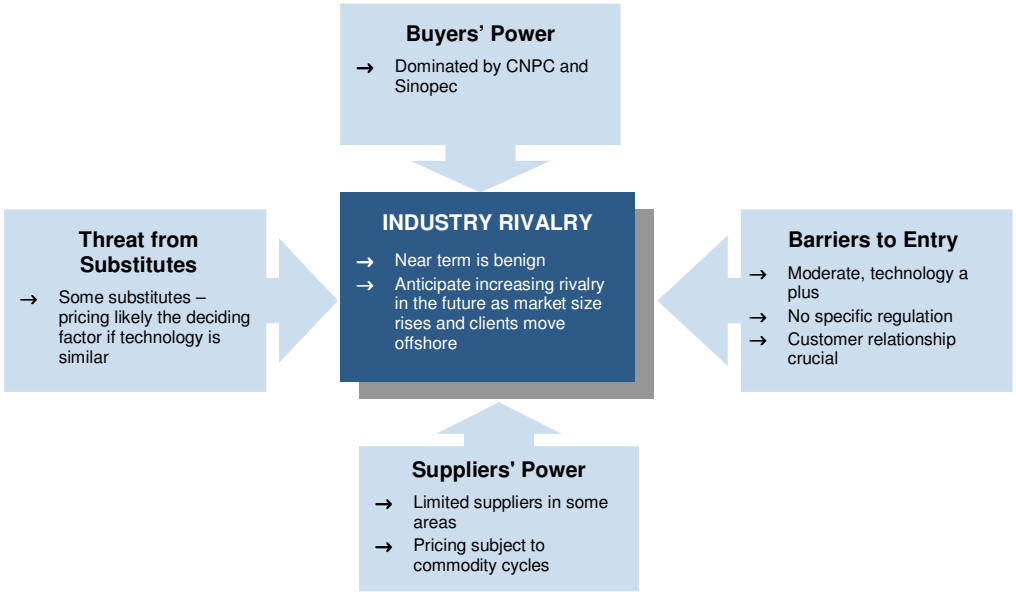
COMPETITIVE LANDSCAPE – PORTER'S FIVE FORCES

INDUSTRY RIVALRY

Like for many niche products in China, demand has been strong enough to absorb new entrants in recent years. China's 2003 and 2004E industrial GDP grew at YoY 30.4% and 53% respectively, with the latter reflecting a low base due to Severe Acute Respiratory Syndrome (SARS). Although fixed asset investment growth should slow to more sustainable levels in the mid-teens for the next few years, the government's target of achieving an average annual GDP growth of 7% in the medium term should continue to drive demand. In addition, the focus on energy security and environmental protection should provide Sunpower with a relatively stable flow of opportunities.

As the market size increases, however, we believe that the risk of new entrants rises. More foreign competitors may emerge as China companies move offshore and gain working relationships with non-Chinese entities. Given the moderate barriers to entry and high buyer power, we anticipate rising industry rivalry in the long term.

EXHIBIT 19: PORTER'S FIVE FORECES



Source: S&P Equity Research

Barriers to Entry

We would rate the barriers to entry as being moderate as there are no particular government regulations that would prohibit or restrict new entrants. The main barriers center on meeting customers needs in terms of product design and funding. The time required to developing a close relationship with customers and the significant working capital needs – with the bulk of payment collection only on product installation – are likely to deter new entrants. A good working relationship with customers and the ability to commercialize its research & development are advantages for Sunpower as it may be asked to develop specific products by clients.

The company enjoys a strong product niche and its tier one vendor status at both Sinopec's and CNPC's material supply network gives the group a significant advantage and pre-qualifies Sunpower to supply products to companies in the Sinopec and CNPC groups.

Threat of Substitute Products

We believe at this stage there is limited substitution from other products but there are ample variants of Sunpower's products. Hence, the industry is fragmented and Sunpower may still be subject to price competition. Sunpower aims to cut competition by distinguishing itself from others via patented formulas for the liquid used in its heat pipes that increases efficiency for its customers. At this stage Sunpower holds 11 patents on its products in China with exclusive access to another three patented products. In its prospectus, Sunpower has listed 13 competitors although we note that there is no mention of a single major competitor across the board for all its products.

Power of Buyers

Given the dominance of CNPC and Sinopec in China's integrated oil & gas and petrochemicals production, we believe that the power of buyers is high. As seen previously, CNPC and the Sinopec group make up more than half of Sunpower's customer base with the latter accounting for an estimated 49% in 2004. Although Sunpower deals with individual units of the Sinopec group, Sinopec management largely sets capital expenditure budgets. In addition, Sinopec is gradually taking its petrochemical subsidiaries private and this may exude even greater control by Sinopec over the group. Since Sunpower is dependent on Sinopec for a large portion of its revenue, we believe Sinopec may be able to dictate pricing of Sunpower's products. Therefore, Sunpower's own bargaining position, in our opinion, is relatively weak.

Power of Suppliers

Depending on the base metals cycle, Sunpower may be subject to a weaker standing with its raw materials suppliers. With current iron ore prices anticipated to rise 72% in China in 2005, it could be difficult to secure items such as iron ore, steel and aluminum – which could prove challenging, and Sunpower may have to be a price-taker. Should over-capacity creep into the base metals sector, however, Sunpower's bargaining position with suppliers is likely to improve.

Moreover, Sunpower relies on a dominant supplier for its pressure vessels resulting from a subcontracting relationship. This may limit the company's bargaining position for pressure vessels. We note that estimated 2004 supplier base appears to be more diversified and this may reflect the company's desire to be less dependent on major suppliers.

EXHIBIT 20: SUNPOWER'S SUPPLIER BASE

As % of Total Purchases	2001	2002	2003	2004e
Major Suppliers (>5% of total purchases)	78.7	83.1	79.4	42.2
Largest	*32.7*	*61.1*	*54.3*	*24.0*

Source: Company Data

EXHIBIT 21: INCOME STATEMENT

FY Dec. / S$ mln	2003	2004	2005F	2006F	2007F
Revenue	19.4	40.1	54.0	80.2	82.0
EBITDA	3.1	9.2	12.7	19.8	14.6
EBITDA margin	16.2%	23.0%	23.5%	24.7%	17.9%
Depreciation & Amortization	(0.2)	(0.4)	(0.9)	(0.9)	(1.0)
EBIT	2.9	8.8	11.8	18.8	13.7
Net interest expense	(0.1)	(0.1)	0.0	0.5	0.7
Pre-tax income	2.9	8.8	11.8	19.3	14.3
Tax	(0.4)	(0.1)	-	(1.4)	(1.1)
Tax Rate	-15.4%	-0.7%	0.0%	-7.5%	-7.5%
Minority interest	-	(0.4)	(1.0)	(2.6)	(1.9)
Net profit	2.4	8.3	10.8	15.2	11.3
Net profit pre-gw and EI	2.4	8.4	10.9	15.3	11.4
Net margin	12.5%	20.7%	20.0%	19.0%	13.8%

Source: Company data, S&P Equity Research

EXHIBIT 22: BALANCE SHEET

FY Dec. / S$ mln	2003	2004	2005F	2006F	2007F
Cash	-	3.5	19.2	33.3	39.8
Current assets	13.3	20.2	41.0	65.8	80.7
Fixed assets	2.1	3.4	8.0	8.1	8.2
Intangible assets	0.0	0.6	0.5	0.4	0.4
Other Assets	0.0	0.0	0.0	0.0	0.0
Total assets	15.4	24.1	49.5	74.4	89.3
Interest bearing debt	1.6	5.3	1.2	1.2	1.2
Other liabilities	10.1	8.9	12.2	19.2	20.9
Total liabilities	11.7	14.2	13.4	20.4	22.1
Common equity	2.0	0.5	5.4	5.4	5.4
Total shareholders' equity	3.7	9.9	36.2	54.0	67.2

Source: Company data, S&P Equity Research

EXHIBIT 23: CASHFLOW STATEMENT

FY Dec. / S$ mln	2003	2004	2005F	2006F	2007F
Cash flow from operations	(2.6)	6.5	10.9	15.0	7.6
Cash flow from investing	(0.6)	(8.3)	(5.5)	(1.0)	(1.0)
Cash flow from financing	1.3	5.3	10.3	-	-
Net Cash flow	(1.9)	3.5	15.7	14.0	6.6
Cash closing	0.0	3.5	19.2	33.3	39.8
Capex	(0.6)	(1.7)	(5.5)	(1.0)	(1.0)
Free cash flow	(3.2)	4.9	5.4	14.0	6.6

Source: Company data, S&P Equity Research

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