EXECUTIVE SUMMARY

Education facilitates the economic growth of a country; hence, its development should be the highest priority. Sustainable economic development is rare without substantial investment in human capital and most Southeast Asian nations need to suitably recognize this fact.

Education is considered an integral part of national development across Southeast Asia, from Singapore, a provider of world-class education, to the Philippines and Vietnam, where the education sector is nascent. The Southeast Asian region spends about 3.7% of GDP on education, lower than developed nations such as the US and the UK which spend 5.6% and 6.3% of GDP, respectively, on education. This reflects immense room for development.

The overall education market in Southeast Asia is poised for growth, given the large school-age population, low enrollment rates, rising income levels, and demand for quality education.

Southeast Asia, which is home to nearly 523 million people, has 172 million school-age children. Based on gross enrolment rates at each level for each country, the region’s school-age population stands at 128 million, with 97 million students attending public schools/institutions and 31 million going to private schools/institutions. We estimate Southeast Asia’s overall education market to be worth USD402 billion in 2010, based on government expenditure on education and estimates of average tuition fees for each country (at each level). Furthermore, we forecast the market to expand to USD661 billion by 2020.

The high potential for growth in Southeast Asia’s education market is well supported by the large school-age population and low enrollment rates, particularly at the pre-primary and tertiary levels. School-age children in Southeast Asia constitute almost 33% of the total population; nearly double that in the US (17%). Furthermore, enrollment rates at the pre-primary and tertiary levels are just 72% and 41%, respectively, vis-à-vis those at the primary (102%) and secondary (80%) levels.

Rising income levels have driven demand for better schools with world-class infrastructure and international curriculums. Emerging markets are expected to contribute to the high demand for education, specifically countries such as Indonesia, Thailand, the Philippines, and Vietnam where income levels are increasing.

Along with various growth factors, the region also faces various challenges such as the high cost of education. Higher tuition fees and other education-related expenditures significantly impact the average Southeast Asian resident, especially in cases where the children study in private schools.

Southeast Asia’s education sector has continued to successfully attract private equity firms from across the world, owing to the above mentioned high growth factors. During 2004–13, nine private equity buys worth USD37.1 million (disclosed value) occurred in the sector. In terms of number of buy deals announced during 2004–13, the most active private equity firms were Navis Invest Partners Asia Ltd (two deals) and Tembusu Partners Pte Ltd (two).
Southeast Asia Education Sector

Other active private equity firms in the sector include Vinacapital Investment Management Ltd, IDG Ventures Vietnam, Mekong Capital Co Ltd, Sirius Venture Consulting Pte Ltd, and Ekuiti Nasional Bhd. Singapore and Vietnam were the focal points of private equity deal activity in the sector, each reporting three of the total nine deals.

In conclusion, the outlook for Southeast Asia’s education sector remains positive. There is substantial scope for growth in each of the region’s countries, from highly developed education markets such as Singapore to emerging ones such as Indonesia, the Philippines, and Vietnam.
Southeast Asia education sector represents a heterogeneous structure

Education helps strengthen the roots of economic development for any country. World Economic Forum considers education as an important pillar amongst the twelve pillars for measuring ‘The Global Competitiveness’. As in the developed nations, priority to education is enshrined in the preamble of constitution for Southeast Asian countries. Education in Southeast Asia forms a heterogeneous structure from a highly advanced Singapore to emerging Thailand and Vietnam.

- **Singapore**: Advanced education infrastructure, innovation-driven, high spending for quality education and encourages private contribution
- **Malaysia and Indonesia**: Good to High standard with focus on higher quality
- **The Philippines, Thailand and Vietnam**: Provision for basic education

**Exhibit 1:** Southeast Asian countries are in various stages of development in terms of education

<table>
<thead>
<tr>
<th>Emerging stage</th>
<th>Developing stage</th>
<th>Advanced stage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Philips, Thailand, Vietnam</td>
<td>Malaysia, Indonesia</td>
<td>Singapore</td>
</tr>
</tbody>
</table>

- Provision for basic education
- Lower educational spending
- Good to high education facilities
- Improving focus on education quality
- Encourages private participation
- Advanced education infrastructure
- Higher spending on education
- Innovation driven
- Established private players


**Singapore: A+ in education**

Singapore has remained at the forefront, not only in the region but also globally. The World Economic Forum ranks Singapore third in terms of the quality of its education system. The country also leads on various educational parameters such as quality of primary education, quality of math science education, quality of management schools, internet access in schools and extent of staff training. Educational facilities provided by Malaysia and Indonesia remain better than the global average, while the same remains inadequate in the Philippines, Thailand and Vietnam.
Southeast Asia Education Sector

Exhibit 2: Ranks on various education parameters (out of 148 countries)

<table>
<thead>
<tr>
<th>Quality of educational system</th>
<th>Quality of Primary education</th>
<th>Quality of management schools</th>
</tr>
</thead>
<tbody>
<tr>
<td>Singapore</td>
<td>2</td>
<td>Singapore</td>
</tr>
<tr>
<td>Malaysia</td>
<td>19</td>
<td>Malaysia</td>
</tr>
<tr>
<td>Indonesia</td>
<td>95</td>
<td>Indonesia</td>
</tr>
<tr>
<td>Philippines</td>
<td>36</td>
<td>Philippines</td>
</tr>
<tr>
<td>Thailand</td>
<td>78</td>
<td>Thailand</td>
</tr>
<tr>
<td>Vietnam</td>
<td>19</td>
<td>Vietnam</td>
</tr>
<tr>
<td>Thailand</td>
<td>78</td>
<td>Thailand</td>
</tr>
<tr>
<td>Vietnam</td>
<td>95</td>
<td>Vietnam</td>
</tr>
</tbody>
</table>


Southeast Asia’s education sector currently a large market

The history of Southeast Asia’s education sector dates back to the post World War II period when each of the newly formed country laid the foundation of formal primary schooling for everyone. The education sector in Southeast Asia was estimated to be around USD402 billion in 2010. Schooling is organized into four main levels: Pre-primary, Primary, Secondary and Tertiary. The school-age population accounts for nearly 33% of the total Southeast Asian population.

Exhibit 3: Southeast Asia education sector’s market size

<table>
<thead>
<tr>
<th>Market size by level of education</th>
<th>Market size by country</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total size: USD402 billion</td>
<td>Indonesia</td>
</tr>
<tr>
<td>3%</td>
<td>Thailand</td>
</tr>
<tr>
<td>11%</td>
<td>Malaysia</td>
</tr>
<tr>
<td>3%</td>
<td>Vietnam</td>
</tr>
</tbody>
</table>

Source: The World Bank, UNESCO, Al Masah Capital Research

Significant addressable market size

The Southeast Asia is home to nearly 523 million people with a school-age population of 172 million (approximately 33%). Based on gross enrollment rates at each level for every country, the school-age population in the region stands at 128 million, with 97 million students attending public schools/institutions and 31 million attending private schools/institutions. The 3–23 age groups represent the total school-age population in Southeast Asia.
Southeast Asia Education Sector

Exhibit 4: Duration of schooling at each level in Southeast Asia

- **PRE-PRIMARY**: 2 Years
- **PRIMARY**: 6 Years
- **INTERMEDIATE**: 3 Years
- **SECONDARY**: 3 Years
- **HIGHER**: 2-6 Years

**General education**

Source: The IMF, OECD, The World Bank, Al Masah Capital Research

Singapore and Thailand led the region, with an enrollment rate of 84%, while the rate has remained the lowest in Vietnam (66%)

Highest school enrollments in Singapore and Thailand

In Southeast Asia, the school-age population was estimated at 172 million in 2010, of which just 74% was enrolled in educational institutions. Singapore and Thailand led the region, with an enrollment rate of 84%, while the rate has remained the lowest in Vietnam (66%).

Southeast Asia’s education sector is largely dominated by public institutions, which account for around two-thirds of total student enrollments. Preference for the private sector remains high at the pre-primary and tertiary levels of education.

Exhibit 5: School enrollments for Southeast Asian countries (Population in millions)

<table>
<thead>
<tr>
<th>Country</th>
<th>Total school-age population</th>
<th>Student population</th>
</tr>
</thead>
<tbody>
<tr>
<td>SE Asia</td>
<td>172</td>
<td>128</td>
</tr>
<tr>
<td>Indonesia</td>
<td>78</td>
<td>58</td>
</tr>
<tr>
<td>Vietnam</td>
<td>32</td>
<td>21</td>
</tr>
<tr>
<td>Philippines</td>
<td>32</td>
<td>24</td>
</tr>
<tr>
<td>Thailand</td>
<td>19</td>
<td>16</td>
</tr>
<tr>
<td>Malaysia</td>
<td>11</td>
<td>7.9</td>
</tr>
<tr>
<td>Singapore</td>
<td>1.0</td>
<td>0.8</td>
</tr>
</tbody>
</table>

Source: The IMF, The World Bank, Al Masah Capital Research

The private sector outperforms public sector in terms of spending on education

Private expenditure on education exceeds public

Although the public sector leads in terms of total student enrollments, the private sector outshines in terms of spending on education. Total government expenditure on education averaged 3.7% of total GDP for Southeast Asia in 2010. Public sector expenditure was the highest in Vietnam (6.8% of GDP), followed by Malaysia (5.1%), Thailand (3.8%), Singapore (3.2%), Indonesia (3.0%) and Philippines (2.7%).
Thailand and the Philippines have highest student-teacher ratio, indicating a scarcity in teaching staff.

Student-teacher ratio lower for emerging markets

The average student-teacher ratio for pre-primary, primary and secondary stood at 19:1, 19:1 and 20:1, respectively in Southeast Asia. Thailand has the highest pre-primary student-teacher ratio (27:1), while the Philippines leads at the primary (31:1) and secondary (35:1) levels, indicating a scarcity in teaching staff.

The student-teacher ratio is defined as ‘The average number of students per teacher at a given level of education’.
MARKET SIZING FOR THE EDUCATION SECTOR AND GROWTH FORECAST

The Southeast Asian education market is projected to be worth USD661 billion by 2020. The private sector is expected to continue as the dominant force, holding 79% of the overall pie. The private sector education market is projected to be worth USD520 billion by 2020.

The market size estimation was carried out using data on population, enrollment rates at various level, expenditure on education by government as well as private expenditure (calculated using average fees charged by private institutions), GDP and inflation.

Within the private K-12 education market, secondary level schooling is expected to account for USD238 billion, followed by Tertiary level (USD162 billion), primary level schooling (USD63.5 billion), and pre-primary schooling (USD57.1 billion).

Source: The IMF, OECD, The World Bank, Al Masah Capital Research

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The Southeast Asian education market is projected to be worth USD661 billion by 2020 with private sector holding 79% of the overall pie.
EDUCATION PROFILE FOR SOUTHEAST ASIAN COUNTRIES

Singapore

Overview

Singapore leads the region in terms of providing quality education. The country’s education system is innovation driven. Singapore ranks among the top 6 out of 148 countries on various parameters such as quality of education system, quality of math science education, quality of management schools, internet access in schools and extent of staff training.

Exhibit 10: Singapore’s education ranking (out of 148 countries)


School-age population and enrollments

In 2010, Singapore’s school-age population accounted for 19% of the total population. Nearly 84% of the total school-age population was enrolled in educational institutions. Enrollment in the public sector represented a major share of 73%, while the private sector accounted for the rest. Private institutions are preferred at pre-primary and tertiary levels of education. Total enrollment in the tertiary sector stood at 76%, higher than any other country in the region.

Exhibit 11: Singapore’s school-age population and enrollments

Source: The IMF, OECD, The World Bank, Al Masah Capital Research
Southeast Asia Education Sector

Expenditure on education

Singapore’s education market size stood at USD11.3 billion in 2010, and is projected to increase at a CAGR of 5.7% to USD19.6 billion during 2010–20.

Exhibit 12: Singapore’s expenditure on education

![Expenditure on education chart]

Source: The IMF, OECD, The World Bank, Al Masah Capital Research

As with enrollment, the public sector surpasses the private sector in terms of total spending on education. Of the total USD11.3 billion, government’s expenditure on education accounts for nearly 2/3rd the total. However, private expenditure is expected to rise at a CAGR of 6.9% to USD7.5 billion by 2020. During the same period, total public sector spending is projected to increase at a CAGR of 5.0% to USD12.1 billion.

Malaysia

Overview

Malaysia performs well with respect to access to education and is ranked among one of the better performer in Southeast Asia, and lagging just behind Singapore.

Exhibit 13: Malaysia’s education ranking (out of 148 countries)

<table>
<thead>
<tr>
<th>#11</th>
<th>#19</th>
<th>#27</th>
<th>#33</th>
<th>#35</th>
<th>#36</th>
</tr>
</thead>
<tbody>
<tr>
<td>Extent of staff training</td>
<td>Quality of educational system</td>
<td>Quality of math science education</td>
<td>Quality of Primary education</td>
<td>Quality of management schools</td>
<td>Internet access in schools</td>
</tr>
</tbody>
</table>


School-age population and enrollments

In 2010, Malaysia’s school age population accounted for 39% of the total population. Nearly 72% of the total school age population was enrolled in educational institutions. Enrollment in public sector represents a whopping share of 88.1%, while private accounts for remaining 11.9% indicating a biased preference towards public institutions over peers in private sector.
Southeast Asia Education Sector

Exhibit 14: Malaysia’s school-age population and enrollments

<table>
<thead>
<tr>
<th>School-age population</th>
<th>Enrollment rate</th>
<th>Student population</th>
<th>Enrollment rate</th>
<th>Student population</th>
</tr>
</thead>
<tbody>
<tr>
<td>10,960,200</td>
<td>72%</td>
<td>7,914,332</td>
<td>Public 88%</td>
<td>6,970,556</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Private 12%</td>
<td>Private : 943,776</td>
</tr>
</tbody>
</table>

Source: The World Bank, UNESCO, Al Masah Capital Research

Malaysia’s education market is projected to increase at a CAGR of 6.5% to USD34.1 billion during 2010–20.

Exhibit 15: Malaysia’s expenditure on education

Source: The IMF, OECD, The World Bank, Al Masah Capital Research

Public sector spending is expected to register a CAGR of 7.6% while private expenditure is expected to grow at a 3.3% CAGR.

Expenditure on education

Malaysia’s education market size stood at USD18.2 billion in 2010 and is projected to increase at a CAGR of 6.5% to USD34.1 billion during 2010–20.

Indonesia

Overview

Indonesia represents the largest education market, accounting for nearly 75% of the total Southeast Asian education market. However, despite its huge size, Indonesia lags behind its Southeast Asian peers such as Singapore and Malaysia in terms of development of the sector.
Southeast Asia Education Sector

Exhibit 16: Indonesia’s education ranking (out of 148 countries)

<table>
<thead>
<tr>
<th>#25</th>
<th>#35</th>
<th>#36</th>
<th>#41</th>
<th>#53</th>
<th>#55</th>
</tr>
</thead>
<tbody>
<tr>
<td>Extent of staff training</td>
<td>Quality of math science education</td>
<td>Quality of educational system</td>
<td>Internet access in schools</td>
<td>Quality of management schools</td>
<td>Quality of Primary education</td>
</tr>
</tbody>
</table>


School-age population and enrollments

In 2010, Indonesia’s school-age population accounted for 32.4% of the total population. The average school enrollment ratio stood at 74% in 2010 for all levels. Of the total school-age population, nearly 66% was enrolled in the public sector and the remaining 34% in the private sector.

Source: The IMF, OECD, The World Bank, Al Masah Capital Research

Expenditure on education

Indonesia’s education market size stood at USD300 billion in 2010 and is projected to increase at a CAGR of 4.9% to USD483 billion during 2010–20.

Source: The IMF, OECD, The World Bank, Al Masah Capital Research
Of the total USD300 billion, private sector expenditure on education accounts for 93%, while the government’s spending accounts for the remaining 7%. Total private expenditure is projected to rise at a CAGR of 4.7% to USD440 billion during 2010–20. Public sector expenditure on education is likely to grow at a faster pace of 7.4% to USD43 billion during the period.

Thailand

Overview

The education system in Thailand is low to moderately developed and lags behind its more developed Asian peers. Thailand’s education market accounts for nearly 11% of the total Southeast Asia education market. The country is taking initiatives in stepping up its educational system.

School-age population and enrollments

In 2010, Thailand’s school-age population accounted for 27.3% of the total population of 69 million. Average school enrollment ratio stood at 84% in 2010 for all levels. Of the total school-age population, nearly 82% was enrolled in the public sector and 18% in the private sector.
Southeast Asia Education Sector

Exhibit 20: Thailand’s school-age population and enrollments

<table>
<thead>
<tr>
<th>School-age population</th>
<th>Enrollment rate</th>
<th>Student population</th>
</tr>
</thead>
<tbody>
<tr>
<td>18,905,200</td>
<td>84%</td>
<td>15,815,145</td>
</tr>
</tbody>
</table>

Source: IMF, OECD, The World Bank, Al Masah Capital Research

Expenditure on education

The Thai education market’s size stood at USD43 billion in 2010 and is projected to increase at a CAGR of 3.3% to USD59.3 billion during 2010–20.

Exhibit 21: Thailand’s expenditure on education

Source: The IMF, OECD, The World Bank, Al Masah Capital Research

Of the total USD43 billion spent on education, the private sector accounts for 72% and the public sector accounts for 28%. Total private expenditure on education is expected to increase at a CAGR of 1.3% to USD35 billion during 2010–20. The government’s expenditure is projected to grow at a faster pace of 7.2% and double to USD24 billion during the period.

Philippines

Overview

Education market in the Philippines accounts for just 3.1% of the total Southeast Asian education market. The country’s education infrastructure has remained moderately developed.
Southeast Asia Education Sector

Exhibit 22: The Philippines’ education ranking (out of 148 countries)

The Philippines’ education ranking (out of 148 countries) is shown in Exhibit 22.


School-age population and enrollments

In 2010, school-age population in the Philippines accounted for 33.8% of the total population. The average school enrollment ratio stood at 77% in 2010. Of the total school-age population, nearly 82% was enrolled in the public sector, and the remaining 18% in the private sector.

Exhibit 23: The Philippines’ school-age population and enrollments

The Philippines’ school-age population and enrollments are displayed in Exhibit 23.

Source: The IMF, OECD, The World Bank, Al Masah Capital Research

Expenditure on education

The Philippines’ education market size stood at USD12 billion in 2010 and is expected to increase rapidly at a CAGR of 6.9% to USD24 billion during 2010–20.

Exhibit 24: The Philippines’ expenditure on education

The Philippines’ expenditure on education is shown in Exhibit 24.

Source: The IMF, OECD, The World Bank, Al Masah Capital Research
Of the total USD12 billion, the share of public sector expenditure on education remains slightly higher at 57%. Total private expenditure is expected to increase at a CAGR of 4.3% to USD11 billion during 2010–20. The government’s expenditure is projected to grow at a faster pace of 9.7% to USD14 billion during the same period.

Vietnam

Overview

Vietnam’s education market is still in an emerging phase and accounts for nearly 4.2% of the total Southeast Asian education market.

Exhibit 25: Vietnam’s education ranking (out of 148 countries)

<table>
<thead>
<tr>
<th>#41</th>
<th>#85</th>
<th>#95</th>
<th>#97</th>
<th>#98</th>
<th>#125</th>
</tr>
</thead>
<tbody>
<tr>
<td>Internet access in schools</td>
<td>Quality of math science education</td>
<td>Quality of educational system</td>
<td>Quality of Primary education</td>
<td>Extent of staff training</td>
<td>Quality of management schools</td>
</tr>
</tbody>
</table>


School-age population and enrollments

In 2010, Vietnam’s school-age population accounted for 37% of the total population. The average school enrollment ratio stood at 65% in 2010, lower than other Southeast Asian nations. Of the total school-age population, nearly 86% were enrolled in the public sector and 14% in the private sector.

Exhibit 26: Vietnam’s school-age population and enrollments

<table>
<thead>
<tr>
<th>School-age population</th>
<th>Enrollment rate</th>
<th>Student population</th>
<th>Enrolment rate</th>
<th>Student population</th>
</tr>
</thead>
<tbody>
<tr>
<td>32,205,200</td>
<td>66%</td>
<td>21,100,541</td>
<td>Public 86%</td>
<td>Public: 18,164,104</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Private 14%</td>
<td>Private: 2,936,437</td>
</tr>
</tbody>
</table>

Source: The IMF, OECD, The World Bank, Al Masah Capital Research

Expenditure on education

Vietnam’s education market size stood at USD17 billion in 2010 and is projected to expand at a CAGR of 9.2% to USD41 billion during 2010–20.
Southeast Asia Education Sector

Exhibit 27: Vietnam’s expenditure on education

Of the total USD17 billion, private expenditure on education accounted for 54%, while the public sector accounted for the remaining 46%. Total private expenditure is estimated to increase at a CAGR of 7.6% to USD19 billion during 2010–20. Public sector expenditure is expected to grow at a faster pace of 10.9% to USD22 billion during the same period.

Source: The IMF, OECD, The World Bank, Al Masah Capital Research
GROWTH DRIVERS FOR SOUTHEAST ASIA’S EDUCATION SECTOR

Large untapped pre-primary and tertiary population

School-age population in Southeast Asia accounts for nearly 33% of the total population, higher than that in the US (17%). Enrollment rates at primary (105%) and secondary (81%) have remained at a good level, while that in the pre-primary and tertiary level hover at just 63% and 30%, respectively. A large school-age population and low enrollment rates indicate immense growth potential for the education sector in Southeast Asia.

Exhibit 28: Lower enrollment rates at pre-primary and tertiary level

<table>
<thead>
<tr>
<th>% of total school-age population</th>
<th>Pre-primary</th>
<th>Primary</th>
<th>Secondary</th>
<th>Tertiary</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>11%</td>
<td>32%</td>
<td>32%</td>
<td>25%</td>
</tr>
<tr>
<td>Enrollment rates</td>
<td>63%</td>
<td>105%</td>
<td>81%</td>
<td>30%</td>
</tr>
</tbody>
</table>

Lower enrollment rates at pre-primary and tertiary level indicate immense potential for growth in SE Asia education sector

Source: The World Bank, Al Masah Capital Research

Rising affluence leading to higher household spending on education

The per capita income for the Southeast Asia stands at USD12,902, clocking a CAGR of 7.6% over 2004-2013. Growing income has prompted parents to opt for better schools with world-class infrastructure and international curriculum for their children. Indonesia which holds the major share of Southeast Asia education market has registered a double-digit growth in its per-capita income. These two factors combined are expected to be highly favorable for the growth of Southeast Asia education market.

The per-capita income for the Southeast Asia is derived using the GDP and the total population for individual countries in the region.
Southeast Asia Education Sector

Southeast Asia allocates on an average 19.1% of government expenditure toward education compared to the world average of 13.9%

Rising government support, higher share for education

Education is top priority for most Southeast Asian governments. The fact is well reflected in the government expenditure on education. The region allocates on an average 19.1% of government expenditure toward education compared to the world average of 13.9%.

Public sector expenditure on education is high in countries such as Thailand, Malaysia and Singapore

Various government initiatives and incentives to promote growth

Singapore

- The Government of Singapore implemented the Compulsory Education Act (CE) in 2003. According to this act, a child of ‘compulsory school age’ is one who is above the age of 6 and is not yet 15 years of age.
- The Ministry of Education (MOE) initiated the MOE Financial Assistance Scheme (MOE FAS) to provide financial assistance to poor Singapore citizen
students enrolled in government or government-aided schools. A student is eligible for MOE FAS if he or she meets either of the following criteria:

- Gross household income (GHI) not exceeding $2,500 per month, or
- Per capita income (PCI) not exceeding $625 per month.

- Financial benefits are also provided to students in independent schools under the MOE’s Independent School Bursaries ISB scheme.

Exhibit 31: Various financial assistance provided by MOE Singapore

<table>
<thead>
<tr>
<th>Monthly Gross Household Income</th>
<th>Per Capita Income</th>
<th>Enhanced Benefits (with effect from January 01, 2014)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Not exceeding $2,500</td>
<td>Not exceeding $625</td>
<td>• 100% subsidy of school fee</td>
</tr>
<tr>
<td></td>
<td>50% school fee subsidy</td>
<td>• Free textbooks and school attire at the secondary level; $750 bursary at the junior college level</td>
</tr>
<tr>
<td>$2,501–4,000</td>
<td>$626–1,000</td>
<td>• 75% subsidy of national exam fees (100% subsidy for students under the MSF Public Assistance Scheme)</td>
</tr>
<tr>
<td>$4,001–5,000</td>
<td>$1,001–1,250</td>
<td>90% school fee subsidy</td>
</tr>
<tr>
<td>$5,001–6,000</td>
<td>$1,251–1,500</td>
<td>70% school fee subsidy</td>
</tr>
<tr>
<td>$6,001–7,200</td>
<td>$1,501–1,800</td>
<td>50% school fee subsidy</td>
</tr>
</tbody>
</table>

Source: Ministry of Education, Singapore

Malaysia

- The Government of Malaysia increased the launching grant for childcare centers at the work place in the public sector to RM200,000 from RM80,000.
- A subsidy of RM180 is provided to civil servants with monthly household income of less than RM2,000.
- The Department of Social Welfare provides financial assistance, known as ‘Bantaun Sekolah’, toward transportation, the purchase of uniforms, examination fees, and spectacles for poor school-age children.
KEY TRENDS IN EDUCATION SECTOR

Growing preference for private schooling for quality education

Private schools outperform their public peers in providing quality education. Alongside, offering an education curriculum that are similar to public schools, private schools typically offer smaller class sizes, more resources, better quality learning tools, more challenging curriculum, and a diverse range of extracurricular activities. These factors have become key filter criteria for Southeast Asian parents while selecting a school for their children. The preference for private schools has remained high at pre-primary and tertiary levels of education.

Higher private fees across Southeast Asian countries

Private schools charge much higher fees than public schools in Southeast Asia. The average private school fee is approximately 2.7x that of a public school for primary level, 4.0x for secondary level and 3.1x at tertiary level.

Rising fees has been a major challenge for the Southeast Asian education sector. Schools at all levels are raising fees every year. According to Singapore’s Early Childhood Development Agency (ECDA), about 25% of the 1,073 childcare centers will be revising fees 5–10% higher in 2014. Along with private schools, public schools have also hiked fees. Leading public universities such as National University of Singapore and Nanyang Technological Universities are increasing fees in range of 10–16% for foreign students and about 2–8% for the nationals.

Development of foreign institutions in Southeast Asian countries

Growth of foreign schooling can be seen across Southeast Asia. As with other parts of the world, residents in Southeast Asia are also seeking British or international education due to the high value of their curricula. Within a short time span, schools offering international curriculum in the region have witnessed significant growth, as demand is outstripping supply.
Southeast Asia Education Sector

SPECIAL FEATURE - CHILDCARE

Childcare is now early education

Southeast Asia mandates no formal education for children below the age of five. However, early schooling is considered an important step as parents believe children who have experienced early childhood education learn faster, are more confident, and interact better; parents also find it easier to enroll children in pre-primary schools. As more parents (male as well as female) are becoming involved part of the workforce, the demand for childcare centers in Southeast Asian countries is increasing.

Large infant and pre-schooling population

In total, infants and pre-school children (0–4 years) constitute almost 9% of the total population in Southeast Asia. The percentage of population in this age group is the highest in the Philippines (12% of the total population), whereas it is the lowest in Singapore (5%).

<table>
<thead>
<tr>
<th>Country</th>
<th>Infant and Pre-school Population (0–4 years)</th>
</tr>
</thead>
<tbody>
<tr>
<td>SE Asia</td>
<td>47,362 (9%)</td>
</tr>
<tr>
<td>Indonesia</td>
<td>21,579 (9%)</td>
</tr>
<tr>
<td>Philippines</td>
<td>11,254 (8%)</td>
</tr>
<tr>
<td>Vietnam</td>
<td>7,110 (6%)</td>
</tr>
<tr>
<td>Thailand</td>
<td>4,361 (6%)</td>
</tr>
<tr>
<td>Malaysia</td>
<td>2,828 (10%)</td>
</tr>
<tr>
<td>Singapore</td>
<td>230 (5%)</td>
</tr>
</tbody>
</table>

Source: The World Bank, Al Masah Capital Research

Higher fees in childcare centers

Singapore and Malaysia have 1,083 and 1,963 registered childcare centers, respectively. Despite the large number of children, childcare is not a common choice for parents in Indonesia due to the low cost of hiring a personal caretaker or childcare provider.
Childcare centers’ fees vary depending on whether they provide full-day or half-day services. For full day service, monthly fees are in range of USD800–950, whereas those for half-day service are USD600–700.

**Recommended teacher-to-child ratio for childcare centers in Singapore**

Singapore’s Ministry of Community Development, Youth and Sports (MCYS) allowed childcare centers to recruit and train para-educators and para-educarers. This was implemented to enhance support for childcare staff and improve interactions between the staff and children.

Along with the introduction of para-educators and para-educarers, MCYS revised the regulatory requirements governing the staff-to-child ratio in childcare centers. The revised ratios are presented below:

<table>
<thead>
<tr>
<th>Age of Children (group type)</th>
<th>Current Staff-to-child Ratio</th>
<th>Revised Staff-to-child Ratio (without para-educators/educarers)</th>
<th>Revised Staff-to-child Ratio (with para-educators/educarers)</th>
</tr>
</thead>
<tbody>
<tr>
<td>18–30 months (Playgroup)</td>
<td>1:8</td>
<td>1:8</td>
<td>1 + 1:12</td>
</tr>
<tr>
<td>30–36 months (Nursery 1)</td>
<td>1:12</td>
<td>1:12</td>
<td>1 + 1:18</td>
</tr>
<tr>
<td>36–48 months (Nursery 2)</td>
<td>1:15</td>
<td>1:15</td>
<td>1 + 1:20</td>
</tr>
<tr>
<td>48–84 months (Kindergarten 1 and 2)</td>
<td>1:25</td>
<td>1:20* (K1)</td>
<td>1 + 1:30</td>
</tr>
</tbody>
</table>
Southeast Asia Education Sector

KEY ISSUES AND CHALLENGES

Shortage of teaching staff

The student-to-teacher ratio has remained high in the region vis-à-vis that in developed nations as well as developing nations. The higher student-to-teacher ratio indicates more students are taught by a single staff member; this impacts the quality of education. Within Southeast Asia, Thailand and the Philippines have the highest ratios, whereas Indonesia and Malaysia have the lowest.

Exhibit 35: Student-to-teacher ratio

Source: GED 2012, Al Masah Capital Research

Cost of education in the region considered to be quite high

The cost of education in Southeast Asia has been increasing. Higher tuition fees and other education-related expenditure significantly impact the average Southeast Asian resident, especially in cases where the children study in private schools.

According to our research, the average annual tuition fee paid per child is USD5,010 for pre-primary, USD7,114 for primary, and USD9,140 for the secondary level of education.

Exhibit 36: Private school fees charged annually in Southeast Asia (USD)

Source: Al Masah Capital Research
Southeast Asia Education Sector

Regulatory landscape

In Southeast Asia, the regulatory environment for education is largely organized. The respective ministries of education in Southeast Asian countries serve as the regulatory as well as developmental authority for education. Along with their focus on the public sector, governments in Southeast Asia are extending their attention to private education.

Singapore’s Ministry of Education (MOE) established the Council for Private Education, an independent council to administer the regulatory framework for the private education sector. Alongside, the MOE has also established the ‘Higher Education Division’ (HED) which oversees the provision of tertiary and technical education as well as registration of private schools in Singapore.

Alongside forming various organized bodies for efficient management in the education sector, governments in various Southeast Asian nations have imposed restrictions, particularly on foreign and private institutions.

- Malaysian’s Ministry of Higher Education, for instance, has placed private higher-education institutions under greater scrutiny, with the government imposing a number of fines on errant operators. The government aims to strike the right balance between promoting growth in higher education along with providing quality education.

- Similarly, the Philippine government has also imposed restrictions on foreign institutions. The Government of the Philippines has put a constitutional ban on foreign ownership of schools. The government mandated ownership of educational institutions (other than those established by religious groups and mission boards) to lie solely with citizens of the Philippines or corporations and associations in which at least 60% of capital is owned by citizens. According to the government, the control and administration of educational institutions should be vested in the citizens of the Philippines.
PRIVATE EQUITY DEALS IN THE SOUTHEAST ASIA EDUCATION SECTOR

Education sector deal activity peaks in 2013

During 2004–13, nine private equity deals worth USD37.1 million (disclosed value) was announced in Southeast Asia’s education sector. The amount appears small because the value of ~75% of total buy deals was undisclosed.

Private equity deal activity in the sector peaked during 2013.

- In September 2013, Ekuiti Nasional Bhd and Navis Investment Partners (Asia) Ltd, together, invested USD21.4 million in acquiring 30% stake in Malaysia-based Brickfields Asia College (BAC). BAC is a renowned law and business college in the country. The investment could enable the private college to meet the requirements specified in certain education licenses.
- In June 2013, Tembusu Partners Pte Ltd invested USD15.7 million in Ednovation Pte Ltd, the owner and operator of a chain of premium ChildFirst pre-schools in China and Singapore. Ednovation plans to utilize the investment toward expansion in key cities across China and Singapore.

Exhibit 37: PE deal activity in the Southeast Asia education sector peaked in 2013

Disclosed deal value in USD million

<table>
<thead>
<tr>
<th>Year</th>
<th>Disclosed deal value (USD million)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2004</td>
<td>NA</td>
</tr>
<tr>
<td>2005</td>
<td>NA</td>
</tr>
<tr>
<td>2006</td>
<td>NA</td>
</tr>
<tr>
<td>2007</td>
<td>1.5</td>
</tr>
<tr>
<td>2008</td>
<td>NA</td>
</tr>
<tr>
<td>2009</td>
<td>NA</td>
</tr>
<tr>
<td>2010</td>
<td>0.4</td>
</tr>
<tr>
<td>2011</td>
<td>NA</td>
</tr>
<tr>
<td>2012</td>
<td>NA</td>
</tr>
<tr>
<td>2013</td>
<td>37.1</td>
</tr>
</tbody>
</table>

Number of deals

<table>
<thead>
<tr>
<th>Year</th>
<th>Number of deals</th>
</tr>
</thead>
<tbody>
<tr>
<td>2004</td>
<td>1</td>
</tr>
<tr>
<td>2005</td>
<td>1</td>
</tr>
<tr>
<td>2006</td>
<td>1</td>
</tr>
<tr>
<td>2007</td>
<td>1</td>
</tr>
<tr>
<td>2008</td>
<td>1</td>
</tr>
<tr>
<td>2009</td>
<td>1</td>
</tr>
<tr>
<td>2010</td>
<td>2</td>
</tr>
<tr>
<td>2011</td>
<td>NA</td>
</tr>
<tr>
<td>2012</td>
<td>NA</td>
</tr>
<tr>
<td>2013</td>
<td>3</td>
</tr>
</tbody>
</table>

Source: Thomson Banker, Al Masah Capital Research

Navis Invest Partners (Asia) Ltd and Tembusu Partners Pte Ltd were the sector’s most active PE funds/firms

Navis Invest Partners Asia Ltd (two) and Tembusu Partners Pte Ltd (two) were the most active private equity firms, in terms of number of buy deals announced during 2004–13.

- Navis Invest Partners Asia (Navis), founded in 1998, has more than 50 controlling investments in its PE portfolio. During 2004–13, Navis bought stakes in Efficient English Services (Indonesia) and Brickfields Asia College (Malaysia).
- Singapore-based Tembusu Partners Pte Ltd (Tembusu) primarily invests in growth-stage companies. During 2004–13, Tembusu bought stakes in Cherie
Southeast Asia Education Sector

Hearts Group International and Ednovation Pte Ltd. Tembusu also has stakes in GlobalRoam Group Ltd, Jiayi International Holdings Limited, Tangshan Ganglu Iron & Steel, and several others.

Other private equity firms active in the Southeast Asia education sector include Vinacapital Investment Management Ltd, IDG Ventures Vietnam, Mekong Capital Co Ltd, Sirius Venture Consulting Pte Ltd, and Ekuiti Nasional Bhd.

Exhibit 38: Most active PE funds/firms in Southeast Asia’s education sector (2004–13)

Source: Company websites, Al Masah Capital Research

Singapore and Vietnam were the most active countries for investments

In 2004–13, Singapore and Vietnam were the focal points of private equity deal activity in Southeast Asia’s education sector, each reporting three of the total nine deals. Malaysia ranked second in terms of private equity interest, based on the number of deals announced in 2004–13. No deals were announced in the Philippines and Thailand during the same period.

Exhibit 39: PE deals in Southeast Asia’s education sector (2004–13)

Source: Thomson Banker, Al Masah Capital Research

In 2004–13, Singapore and Vietnam were the focal points of private equity deal activity in Southeast Asia’s education sector, each reporting three of the total nine deals.
Private equity exits have been slow, but delivered significant gains

About four private equity exits were announced in Southeast Asia’s education sector during the last 10 years. However, due to poor disclosures on their exit values, just a few deals are discussed below.

- In 2012, Navis Invest Partners Asia sold its stake in Indonesia-based Efficient English Services for a total value of USD16.3 million to Pearson PLC, a leading global publishing and education company. The exit deal produced a money multiple of 10.6x for Navis Invest Partners Asia. The annualized rate for return for Navis stood at 68%.

- In 2011, Tembusu Growth Fund divested its stake in Cherie hearts through a negotiated management buyout to Australia-based G8 Education Ltd. The annualized rate of return for Tembusu was 72%.
COMPANIES IN THE EDUCATION BUSINESS

Few companies in Southeast Asia education sector are publicly listed

Just a handful of education companies are listed on bourses across Southeast Asia. Philippines-based Far Eastern University, with a market capitalization of USD339 million, is the most valuable publicly listed company in the region’s education sector. Malaysia-based Seg International Berhad follows closely, with a market capitalization of USD320.3 million.

Our data indicates FSSTI (Singapore) and FBMKLCI (Malaysia) have the highest number of education companies (four each) listed on any Southeast Asian indices. The four listed companies have a combined market capitalization of ~USD60.3 million on the FSSTI, whereas those on the FBMKLCI have a total market cap of ~USD436.4 million.

<table>
<thead>
<tr>
<th>Company</th>
<th>Country</th>
<th>Market Cap USD million</th>
<th>Price-to-Earnings TTM</th>
<th>Price-to-Book Last</th>
<th>EV-to-EBITDA TTM</th>
</tr>
</thead>
<tbody>
<tr>
<td>Far Eastern University</td>
<td>Philippines</td>
<td>339.2</td>
<td>18.9</td>
<td>3.1</td>
<td>19.4</td>
</tr>
<tr>
<td>Seg International Berhad</td>
<td>Malaysia</td>
<td>320.3</td>
<td>30.1</td>
<td>3.9</td>
<td>35.1</td>
</tr>
<tr>
<td>Overseas Education Ltd</td>
<td>Singapore</td>
<td>266.8</td>
<td>14.2</td>
<td>5.8</td>
<td>-</td>
</tr>
<tr>
<td>Raffles Education Corp Ltd</td>
<td>Singapore</td>
<td>226.5</td>
<td>13.5</td>
<td>0.5</td>
<td>31.3</td>
</tr>
<tr>
<td>Informatics Education Ltd</td>
<td>Singapore</td>
<td>100.5</td>
<td>32.3</td>
<td>5.5</td>
<td>21.2</td>
</tr>
<tr>
<td>Centro Escolar University</td>
<td>Philippines</td>
<td>86.6</td>
<td>13.1</td>
<td>1.5</td>
<td>7.8</td>
</tr>
<tr>
<td>Eduspec Holdings Bhd</td>
<td>Malaysia</td>
<td>57.2</td>
<td>-</td>
<td>7.3</td>
<td>-</td>
</tr>
<tr>
<td>Masterskill Education Group Berhad</td>
<td>Malaysia</td>
<td>36.9</td>
<td>-</td>
<td>0.3</td>
<td>-</td>
</tr>
<tr>
<td>Apft Bhd</td>
<td>Malaysia</td>
<td>22.0</td>
<td>-</td>
<td>1.3</td>
<td>-</td>
</tr>
<tr>
<td>TMC Education Corporation Ltd</td>
<td>Singapore</td>
<td>9.3</td>
<td>-</td>
<td>2.3</td>
<td>-</td>
</tr>
<tr>
<td><strong>Average</strong></td>
<td></td>
<td><strong>20.4</strong></td>
<td><strong>3.2</strong></td>
<td><strong>23.0</strong></td>
<td></td>
</tr>
</tbody>
</table>

Source: Thomson Reuters; data as of March 6, 2014
OUTLOOK FOR SOUTHEAST ASIA’S EDUCATION MARKET

The outlook for the education sector in Southeast Asia remains positive. There is substantial scope for growth in every Southeast Asian country, from highly developed education markets such as Singapore to emerging ones such as Indonesia, the Philippines, and Vietnam.

Given the size of the school-age population and the shortage of schools/educational institutes and teachers, the Southeast Asian education sector represents significant untapped potential.

The high enrollment rates at the primary and secondary levels in Southeast Asia are commendable. Furthermore, pre-primary and tertiary enrollment rates, which are higher vis-à-vis the global average, are lower compared to those in primary and secondary. This indicates immense room for future growth. Separately, private sector involvement in education would need to increase to achieve long-term sustainable growth without burdening government coffers.

The rapid entry of private players, in the form of foreign schools and universities, in the region is expected to further accelerate growth. More private participation may prove helpful in reducing fees (a major concern at present) to some extent.

In conclusion, though the present education structure in Southeast Asia has significantly improved in comparison with that a decade ago, there is room for immense growth in coming years.
Southeast Asia Education Sector

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