Healthcare

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Minister of Health

The Healthcare National Key Economic Area (NKEA) has continued to deliver commendable results on top of an outstanding 2012. The goal of the NKEA is to stimulate economic growth in the healthcare industry and I am pleased to note that the Entry Point Projects (EPPs) have shown encouraging progress, with most of the planned initiatives implemented and producing good results.

The Economic Transformation Programme (ETP) has attracted the interest of many private sector companies in its catalytic EPPs, and the Healthcare NKEA has seen similar private participation. Under this NKEA, a total of 22 projects covering 10 EPPs and one Business Opportunity (BO) have been announced by the Prime Minister. They are expected to contribute RM4.6 billion to the Gross National Income (GNI), while generating investments totalling RM3.7 billion. The NKEA is also expected to create 18,316 jobs by 2020.

The last 12 months saw a number of significant developments under this NKEA including the corporatisation of Clinical Research Malaysia (CRM), a unit under the Clinical Research Centre of the Ministry of Health. The exercise will enable CRM to efficiently perform its role as a business unit, in working closely with the pharmaceutical industry to bring industry-sponsored clinical trials into the country.

I am also pleased to report that the Medical Devices Act 2012 and the Medical Devices Authority Act 2012 were gazetted last year. The gazetting of the Acts and their regulations will ensure that the medical devices industry is better regulated in Malaysia.

It is my firm and sincere belief that we are now in a better position to respond to the expectations of our nation to develop an effective and responsive healthcare system, which is safe, effective, and equitable. We are indeed well on our way to becoming "A Nation Working Together For Better Health".

HEALTHCARE

The primary role of any healthcare delivery system is the same: To deliver the highest quality of care to the greatest number of people in a sustainable manner. Though these principles are shared by all, specific differences exist from one region to the next. In all cases, healthcare involves the participation of multiple stakeholders ranging from Government authorities and agencies to non-governmental organisations and private healthcare providers.

In Malaysia, the sector is, in addition to being the key deliverers of healthcare, also one of the leading drivers of economic growth. Changing demographics, a more affluent society and more health-conscious lifestyles have led to the creation of a robust domestic industry. There are clear signs that indicate that the advancement and development of the healthcare industry in Malaysia is necessary and compulsory with a vast potential for greater development, setting in motion, the Healthcare NKEA.

The primary goal of the Healthcare NKEA is to facilitate the development of Malaysia's healthcare sector by identifying and supporting collaborative efforts between the public and private healthcare providers. These initiatives are further supported by the Ministry of Health (MoH), which is directly responsible for the growth of the industry. In doing so, the MoH will expand beyond its current roles of being the main healthcare service provider and sector regulator.

Both the Government and private sector providers play important roles in the nation's healthcare sector.

While the Government, with its commitment to universal access, subsidises Government hospitals and clinics throughout the nation, enabling affordable quality healthcare to all, the private sector, meanwhile, runs the gamut in terms of affordability, and helps by providing access to more healthcare services for those who can afford to pay and thus, reducing the burden of the Government. The public and private sectors thus work together to offer a comprehensive range of medical services, while ensuring that all the community has equitable access regardless of background.

Private sector healthcare is a significant driver of economic growth in this sector, and has quickly become a crucial segment in Malaysia's overall economy. The NKEA thus places special emphasis on encouraging greater private sector participation in healthcare to further drive growth.

The healthcare sector is targeted to generate RM35.5 billion in GNI and create 181,000 jobs by 2020. To achieve these numbers, the NKEA introduced six EPPs and two BOs at the start of the ETP.

One of the BOs pertaining to medical devices was converted into seven EPPs, bringing the present total to 13 EPPs and one BO. Another lab was held last September 2012 to convert the remaining BO pertaining to Senior Living into implementable EPPs. Fifty representatives from the public and private sectors participated in the five-week lab held in Kelana Jaya, expanding it into three potential new EPPs.

These EPPs are expected to further transform the healthcare industry in Malaysia into a vibrant and holistic sector, emphasising quality service and comprehensive delivery for all Malaysians.

2012 Key Performance Indicators

Healthcare NKEA		KPI (Quantitative)				
				Achievement		
No.	**KPI**	**Target (FY)**	**Actual (YTD)**	**Method 1**	**Method 2**	**Method 3**
				%	**%**	
EPP #1	Percentage of foreign workers with health insurance	100%	143% Remarks: 1) 1,607,683 2) 100% (Baseline - exclude domestic maids in Peninsular Malaysia, Sabah and Sarawak and plantation workers in Peninsular Malaysia)	143	100	1.0
EPP #2	Number of research conducted	300	319 (140 ongoing + 179 new)	106	100	1.0
EPP #3	Export growth of pharmaceutical products (RM mil)	641.8	512.21 (Data until end November 2012)	80	80	0.5
EPP #4	Revenue generated from healthcare travel (RM mil)	548	558.59 (Data until end November 2012)	102	100	1.0
EPP #5	Number of MoH hospitals that subscribe to the Diagnostic Service Nexus services	4	4	100	100	1.0
	Number of private facilities that subscribe to the Diagnostic Service Nexus service	5	6	120	100	1.0
EPP #6	Completion of 5.5% of UMHM by end of 2012 (Milestones: Construction starts in June 2012 and piling work to commence in December 2012)	5.5%	5%	91	91	0.5
EPP #7	Medical Device Authority set up	May 2012	100%	100	100	1.0
	Effective date of Medical Devices Act	October 2012	100%	100	100	1.0
				105%	**97%**	**89%**

Exhibit 12.1

Method 1 Scoring is calculated by a simple comparison against set 2012 targets. The overall NKRA composite scoring is the average of all scores

Method 2 Scoring is calculated by dividing actual results against set 2012 targets with an added rule:
- If the scoring is less than 100%, score #2 is taken as the actual percentage
- If the scoring is equal or more than 100%, score#2 is taken as 100% The overall NKRA composite scoring is the average of all scores

Method 3 Scoring is calculated by dividing actual results against set 2012 targets with an added rule:
- If the scoring is equal and less than 50%, score #3 is indicated as 0
- If the scoring is more than 50% and less than 99%, score #3 is indicated as 0.5
- If the scoring is equal or more than 100%, score #3 is indicated as 1

EPP 1 Mandating Private Health Insurance for Foreign Workers

Some 3.1 million foreign workers in Malaysia were employed in low-technology, labour intensive jobs in 2012, with recent data showing that half were either uninsured or under-insured. Over the last five years, approximately RM71 million in unpaid bills were incurred by foreigners at Government hospitals, putting additional strain on Malaysia's healthcare costs.

This EPP, is led by MoH and calls for mandatory private health insurance for foreign workers, which will help relieve stress on Malaysia's healthcare system and provide better protection for the foreign workers. Under this EPP, the Hospitalisation and Surgical Scheme for Foreign Workers (SPIKPA) was introduced and is a mandatory medical scheme designed for foreign workers. With an annual premium of RM120, the scheme provides hospitalisation and medical coverage to foreign workers with a total coverage of RM10,000 per annum for all sickness and injuries requiring admission into MoH hospitals.

This scheme came into effect on 1 January 2011, targeting 1.2 million workers in the initial stages. This figure was surpassed as over 1.4 million workers were insured. Twenty-five insurance companies and two Third Party Claims Administrators (TPCA) were registered as participants of the SPIKPA by the end of 2011.

Achievements and Challenges

The scheme was extended into Sabah last July and provided coverage for 1.6 million foreign workers as at 31 December 2012. While the SPIKPA has successfully insured almost all foreign workers in Malaysia, there have been challenges in some specific job areas including domestic maids and plantation workers. The MoH is currently addressing these areas to further strengthen the healthcare system and safeguard foreign workers.

Moving Forward

Having reached the target of launching the insurance scheme and making it mandatory, the project team will continue to work with organisations to ensure that most, if not all, foreign workers in all sectors are covered under the SPIKPA.

In addition, MoH is planning to further expand the programme into Sarawak by February 2013, following approval by the Sarawak State Government. The scheme in Sarawak will cover all foreign workers, except plantation workers in the palm oil industry.

EPP 2 Creating Supportive Ecosystem to Grow Clinical Research

The contract research industry for new drug development grew at an annual rate of 15 per cent globally to exceed US$20 billion in 2009. Asia, meanwhile, outpaced that rate, posting an annual growth rate of 30 per cent to reach US$1.6 billion. However, Malaysia has lagged behind its peers, including Thailand, Singapore and the Philippines, based on data from ClinicalTrials.gov.

By 2020, this EPP's target is to conduct at least 1,000 clinical trials and develop a supportive clinical research ecosystem that allows for more efficient and higher quality trials.

Achievements and Challenges

In driving this agenda, Clinical Research Malaysia (CRM), under MoH, was established to stimulate the growth of clinical trials in Malaysia. On 15 June 2012, CRM was corporatised, enabling it to function independently and be less constrained by bureaucracy.

Since the launch of CRM and in consultation with the public and private hospital industry and MoH, seven new MoH Hospitals CRCs (HCRCs) were established in the last two years, bringing the total number to 27 HCRCs. Ten of them are equipped to be Centres of Excellence for research. Meanwhile, the MoH Medical Research Ethics Committee has increased its reviews to twice a month, which has helped speed up approval timelines.

CRM is also undertaking a number of additional initiatives to support the development of this sector including:

- strengthening sites that are actively involved in industry-sponsored research (ISR)
- developing the clinical research management systems
- engaging with MoH hospitals through roadshows
- meeting with private and universities hospitals to increase the number of research sites
- working with the pharmaceutical industry to raise ISR rates

Owing to the rapid pace of achievements, the key performance indicator (KPI) for this EPP was revised upwards, raising the number of clinical researches targeted to 300 by the end of 2012 from 270. By the end of 2012, 319 clinical trials were conducted, thus surpassing the target.

One of the key obstacles to the development of this sector is a lack of available skilled workers owing to Malaysia's status as an emerging market in the area of clinical research. Plans are being put in place to build a talent pool of clinical research associates for international Clinical Research Organisations (CROs) in Malaysia, as well as site coordinators to assist in the conducting of ISR and other research-related teams.

Moving Forward

The CRM, with the cooperation of MoH and all hospital networks, aims to draw more clinical trials to the country by functioning as a one-stop business centre to facilitate and enable speedy, quality trials. The CRM will also encourage local researchers to enhance their competencies with the necessary training and resources.

In terms of specific initiatives, CRM aims to accomplish the following:

- streamline and strengthen ethical and governance submission and approvals
- promote centres of excellence emphasising service, research and teaching
- complement health tourism, local pharmaceutical and medical technology industries
- build on the strengths of MoH's integrated network and information system to enable transparent payments

EPP 3 Malaysian Pharmaceuticals: Increasing Local Generic Manufacturing for Exports

With the patents on many major drugs poised to expire in the coming years, Malaysia can position itself to exploit this opportunity by boosting its generic drug manufacturing capacity. Some US$132 billion in patents is set to expire between 2010 and 2014, which will open up significant opportunities for the generic drug manufacturing sector.

In order to make the most of this opportunity, the Malaysian industry needs to transform itself in three areas:

- **It needs to create an export platform:** The Organisation of Islamic Conference (OIC) countries and other developing countries are potentially lucrative markets for the export of generic drugs. Malaysia, which is a member of the highly regarded Pharmaceutical Inspection Convention and Pharmaceutical Inspection Cooperation Scheme (PIC/S), can leverage its position to export to these countries.
- **It needs to drive the localisation and upgrading efforts of local manufacturing plants:** Local manufacturing plants presently do not have the capacity to produce en masse, thus forcing them to seek out foreign manufacturers. A localisation and upgrading drive will help build the necessary capacity.
- **It needs to develop strong collaboration between Multinational Corporations (MNCs) and local manufacturers:** Local manufacturers can benefit from the expertise of MNCs and acquire best practices associated with the manufacture of generics. This will in turn help build local capacity and develop strong local champions in this sector.

Achievements and Challenges

The industry benefited from the Hovid Objective Pharmaceutical Excellence (HOPE), an agreement to develop two generic drugs between Sanofi Aventis Group's subsidiary Winthrop (M) Sdn Bhd and Hovid. The deal, which was valued at RM5 million for the first three years, was extended at the end 2011 to include four new generic medicines.

In September 2012, Ranbaxy Laboratories Limited, India's largest pharmaceutical company in a joint venture with local partners, are investing RM125 million to set up a second manufacturing plant in Malaysia which will become one of Ranbaxy's eight global manufacturing hubs for the export of generic drugs. This project is managed by Ranbaxy Malaysia Sdn Bhd.

In December 2012, Biocon Limited entered into an agreement with Chemical Company of Malaysia (CCM) Pharmaceuticals Sdn Bhd to exclusively distribute Biocon's insulin products in Malaysia and Brunei.

The Government has also agreed to let local manufacturers producing new pharmaceutical products contract an Off-Take Agreement (OTA) with MoH for three years. This means that MoH will agree to be the buyer of the manufacturer's future production.

If the manufacturer demonstrates that the product can be registered and marketed in other countries, the OTA may be extended for another two years. The MoH expects to sign the first OTA in early 2013.

One challenge facing this EPP is import barriers in countries such as Indonesia that adopt protective market stances. For example, in Indonesia, generic drugs cannot be distributed unless they were manufactured within its shores. The project team for this EPP is currently working on opening up these markets through diplomatic and trade channels.

Moving Forward

This EPP is targeting a GNI of RM13.8 billion by 2020, and the creation of 12,440 jobs. In 2013, the focus will be to continue working with MoH to optimise local facilities, as well as review and address issues relating to pharmaceutical patent law and policy in Malaysia.

The Healthcare NKEA team will be collaborating with MNC pharmaceutical companies and local players to take into consideration the impact of and changes in healthcare regulations in local and international markets. Strategies that were put in place during the 2010 lab to drive generics opportunities will also be reviewed.

Additionally, the construction of the first phase of Biocon's facility in BioXcell, Iskandar, is currently underway and expected to be completed by 2014.

Biocon's facility site in BioXcell, Iskandar

EPP 4 Reinvigorating Healthcare Travel

The ETP Roadmap expected global health travel to reach US$75 billion in 2010 with ASEAN countries contributing US$3 billion to the total. Despite an average of 22 per cent per annum growth, Malaysia's healthcare travel receipts are small with a US$100 million contribution to Malaysia's economy in 2010.

While the sector shows strong potential, competing countries such as Singapore and Thailand have shown stronger growth and are now perceived as leaders in the high-value healthcare business. The Malaysian healthcare travel industry thus needs to establish a clear position, and transform its industry by broadening its patient base in two phases.

In the first phase, patient volume needs to grow and expand through extensive marketing, cross-border alliance and enhanced customer experience. The second phase will require the construction of better infrastructure and specialist capacity in niche specialisations to drive a shift towards more profitable in-patient care.

The primary agency responsible for the development and promotion of the healthcare travel industry is the Malaysia Healthcare Travel Council (MHTC), designed to be a one-stop centre for all matters related to healthcare travel.

Achievements and Challenges

The efforts to boost the sector's development have resulted in increased commitments from the Sime Darby Healthcare and Kumpulan Perubatan Johor (KPJ) groups to establish new hospitals catering to increased demands from the local population and healthcare travellers.

Sime Darby Park City Medical Centre

In March 2012, Sime Darby Medical Centre (SDMC) Ara Damansara, a 220-bed hospital facility, opened its doors to the public. Sime Darby has constructed another facility specialising in women's and children's healthcare, which was completed in December 2012. Meanwhile, KPJ announced that it will build five different hospitals nationwide by 2014, including the newly-completed Klang Specialist Hospital. The Amanjaya Specialist Centre Green Hospital with 108 beds is currently under construction in Sungai Petani, Kedah, and is expected to be completed by early 2014.

As of November 2012, a total of RM558.59 million was generated from healthcare travel. Since MHTC's official website launch on 5 April 2012, 62 new hospitals and 10 ambulatory centres have registered with the Council.

As for its promotional efforts, MHTC has undertaken vigorous marketing activities overseas to promote Malaysia as a healthcare destination. Patients from Indonesia appear to be particularly attracted to the facilities offered in Malaysia, making up 70 per cent of the total number of healthcare travellers to Malaysia.

The first Malaysia International Healthcare Travel Expo (MIHTE) was held in November 2012 at the Sunway Pyramid Convention Centre to further boost Malaysia's profile on the healthcare travel map. The three-day conference and expo attracted 1,300 delegates from 34 countries around the world and saw 94 booths set up by 84 organisations involved in the healthcare travel value chain. The expo received an additional 500 visitors, and secured business prospects of at least RM500,000.

The last 12 months also saw the establishment of a medical concierge in the Kuala Lumpur International Airport (KLIA) attending to enquiries and promoting healthcare in Malaysia to tourists.

Amanjaya Specialist Centre Green Hospital current site progress

A new tax incentive by the Government was put in place to encourage local investors to take part in the health travel business, and for existing operators to expand and upgrade their facilities to further attract foreign patients.

KPJ Pahang Specialist artist impression

One of the main challenges of this EPP is to place Malaysia on par with the rest of the countries involved in health travel. While competitive in service, Malaysia has lagged behind its neighbouring ASEAN countries which developed their health travel markets much earlier.

Moving Forward

The MHTC will develop and continue to carry out intensive promotional efforts to existing and new target markets. The MIHTE will now be an annual affair as an important event in the healthcare travel industry. The MHTC will be working extensively with the relevant organisations to develop outreach programmes for healthcare travel as well as continue to create awareness on Malaysia's advancing healthcare infrastructure.

KPJ Pasir Gudang artist impression

KPJ Bandar Baru Klang

EPP 5 Creating a Diagnostic Services Nexus

Public hospitals are facing steep challenges in coping with demand in radiology diagnostic services as only 25 per cent of them have radiologists on-site. With 45 per cent of radiologists concentrated in the Klang Valley and in larger cities, the uneven distribution of radiology workload leads to longer turnaround times for proper diagnosis. This is also true for privately-owned health facilities in smaller towns that lack radiologists.

The Diagnostic Services Nexus (DSN) aims to reduce these wait times by coordinating and distributing workload using a teleradiology system that connects with both the public and private sectors. The ultimate goal is to create scale and scope in domestic radiology and to then leverage the experience internationally.

Achievements and Challenges

DSN is a private consortium of strategic technology, telecommunications and operations partners. General Electric (GE) Healthcare is the technology partner for DSN.

In September 2011, the Kuala Lumpur and Selayang Hospitals participated as pilot sites, and were fitted-out with the relevant infrastructure. Hospital staff were also given special training sessions and a trial transmission period of images conducted during the first phase. The second phase saw the first of 50 images officially transmitted from Hospital Selayang to DSN and read by UMMC radiologists on 27 March, 2012.

DSN then went live in Hospital Kuala Lumpur on 16 April, 2012. An additional two public hospitals and six private hospitals will be hooked up to DSN by the end of 2012. More than 6,000 images have been transmitted and reported to date.

Moving Forward

DSN will continue to roll out and improve upon the DSN technology to provide services to private and public hospitals, as well as work on the goal of exporting teleradiology services to other countries. In 2013, DSN will focus on building capacity and branding its services by linking radiologists throughout the country to ensure the system is sustainable.

DSN will also market itself regionally, and seek in-sourcing services from other countries. DSN will recruit more radiologists to the pool and continue to work with GE Healthcare to improve the technology and infrastructure.

EPP 6 Developing a Health Metropolis: A World-Class Campus for Healthcare and Bioscience

The University of Malaya Health Metropolis (UMHM) is a flagship project spearheading a unique project that will see the creation of a unique metropolis. The metropolis will combine with urban renewal efforts to deliver better education, research and clinical care.

Together with the Faculty of Medicine, University of Malaya Medical Centre (UMMC) and UM Specialist Centre (UMSC), UMHM will become Malaysia's biggest cluster for medical education, healthcare, medical and bioscience research.

When complete, it will house a 320-bed hospital, a 338-room healthcare hotel, a medical research centre, convention and exhibition facilities, and other supporting retail facilities. UMHM is expected to commence development work upon receiving Planning Approval, and be fully operational by 2017.

UM Holdings Sdn Bhd (UMH), which is wholly-owned by the University of Malaya, has been entrusted with the task of developing and positioning the UMHM as Malaysia's premier medical hub, and as one of the centres of excellence for health, medical care and bioscience in Malaysia.

UMHM is designed to serve both local and regional needs, and will spearhead efforts in nurturing quality medical and healthcare professionals in education, research and other supporting healthcare services.

Achievements and Challenges

On 30 September, 2011 UM Holdings submitted the application for Planning Permission (*Kebenaran Merancang*) to MBPJ, and was identified as the key owner spearheading the development of UMHM.

The application for Planning Approval is presently being processed, and PEMANDU has intervened to expedite the process through critical stages such as making decisions on the provision of Mass Rapid Transit (MRT) services and the location of MRT stations.

The tax advisor for UMHM, KPMG has also finalised a paper on the proposed tax incentives for UMHM, which is being studied by the Ministry of Finance.

Moving Forward

Upon receiving the Planning Permission, site clearing and earthworks will commence and the entire construction programme for the facility is targeted to be ready by 2017. UMHM will also continue discussions and engagements with strategic business partners towards realising the potentials and opportunities at UMHM.

Medical Devices EPP

The medical devices industry in Malaysia is at a critical turning point. It is relatively young and constitutes approximately 20 to 25 per cent of Malaysia's healthcare spending today. Given Malaysia's low-cost factor, high quality assurances, strong and relevant capabilities from large electronics and electrical industry (E&E), skilled English-speaking and multilingual workforce, strong IP protection regulatory framework and access to Asia, Malaysia is well-positioned to increase the size and profitability of its medical devices industry.

The EPP project team has identified seven EPPs as well as their champions, which will further forward the work undertaken by the Healthcare NKEA. These EPPs are:

- Upscale Malaysia IVD Industry (EPP 7)
- Build Malaysian Showcase on Next Generation of Core Single Use Device (SUD) Products (EPP 8)
- Become the Hub for High-Value Medical Devices Contract Manufacturing (EPP 9)
- Create Malaysian Clinical Devices Champions (EPP 10)
- Medical Equipment Supply Chain Orchestration (EPP 11)
- Medical Equipment Refurbishment Hub (EPP 12)
- Build Medical Hardware and Furniture Cluster (EPP 13)

Achievements and Challenges

The Medical Device Authority (MDA) was set up in August 2012 as a statutory body entrusted to enforce and implement the Medical Device Act 2012 (Act 737) which will in turn draft the Medical Device Regulation 2012 to support the implementation of Act 737.

As most of the manufacturing companies in Malaysia are small to medium enterprises (SMEs), they will require incentives from the Government to further expand their businesses to support this industry.

EPP 7 Upscale Malaysia's IVD Industry

Mediven's product packaging

In November 2012, Medical Innovation Ventures Sdn Bhd (Mediven), a medical diagnostics company, announced a total investment of RM8.92 million in its In-Vitro Diagnostic (IVD) project. Focusing on commercialising local technologies to combat tropical infectious diseases, this investment will form the basis to upscale Malaysia's IVD industry and eventually raise Malaysia's profile in IVD globally, beginning with developing countries.

EPP 8 Build Malaysian Showcase on Next Generation of Core Single Use Device (SUD) Products

In November 2012, the Prime Minister announced Vigilenz Medical Devices Sdn Bhd as one of the first local medical devices manufacturers to help position Malaysia as the preferred supplier for high-quality contract manufacturing of SUDs.

Vigilenz will invest RM25.8 million under Project EXDEV to conduct R&D to extend its current product-line. This includes completing the entire line of suture (including cardiovascular and ophthalmic) and the expansion of a hernia range of sutures with composite/bioresorbable materials. In addition, Vigilenz is planning to introduce interventional cardiovascular products, and develop new wound management material and bio-material for tissue reconstruction. The project is expected to start in 2013, and looks to export 65 per cent of the products overseas.

Vigilenz factory in Bukit Minyak

EPP 9 Become the Hub for High-Value Medical Devices Contract Manufacturing

In September 2012, Medical Devices Corporation Sdn Bhd (MDC) announced that it will set up a Contract Manufacturing Hub for medical devices and pharmaceuticals. MDC will be able to help more Malaysian entrepreneurs participate in growing the domestic industry now that the company is a part of the ETP.

By 2020, MDC plans to invest a total of RM88.55 million to develop manufacturing capacity to produce DEHP Free Medical PVC Granule, Medical Tubings and Sheets, IV Administrative Sets and Haemodialysis Blood Lines, Peritoneal Dialysis (CAPD and CCPD) and Blood and Plasma Collection Bags.

Meanwhile, Straits Orthopaedics (Mfg) Sdn Bhd, a local company specialising in manufacturing, cleaning, and packaging orthopaedic devices and accessories, announced plans in November 2012 to expand its product offerings to include spinal implants and joint replacement products.

The combination of machining, forging, casting and all other surface finishing capabilities will make Malaysia a one-stop hub for a comprehensive range of orthopaedic devices for MNC orthopaedic companies. By 2020, Straits plans to invest a total of RM76.38 million in this area.

Straits Orthopaedics factory at Teluk Kumbar, Bayan Lepas

EPP 10 Malaysian Clinical Device Champions

Throughout 2012, this EPP focused on preparing three potential project owners to launch their projects announced in 2013. All three projects are related to the orthopaedic implant manufacturing industry.

This EPP is still in its early stages of implementation and updates are scheduled to be included in the ETP Progress Update Announcement in early 2013.

EPP 11 Medical Equipment Supply Chain Orchestration

UWC Holdings has invested in the construction of an 80,000 square feet facility in Bukit Minyak, Penang, dedicated to manufacturing medical equipment, including hospital beds, trolleys, stretchers, immobilisers and pre-filled humidifiers. This facility became fully operational in September 2012. By 2020, UWC will invest RM40.14 million.

UWC's new manufacturing facility at Bukit Minyak

EPP 12 Medical Equipment Refurbishment Hub

As a first step towards establishing a local medical equipment refurbishment hub, representatives from the Medical Devices Bureau, which has now been re-designated the Medical Devices Authority, were sent on a four-day training course to Siemens Refurbished Systems Headquarters in Forccheim, Germany.

The training on OEM Refurbishment in Germany helped the representatives get a better understanding of the actual refurbishment process, and the participants were exposed to an overview of the entire process.

The next step is for the Medical Devices Authority to launch an awareness programme on refurbished systems and introduce regulations for the sub-sector in order to generate interest in the industry. This EPP will enable lower purchasing costs and maintenance costs for quality medical equipment.

EPP 13 Build Medical Hardware and Furniture Cluster

In 2012, LKL Advance Metaltech Sdn Bhd expanded its premises, workforce and manufacturing capacity. The construction of a new 70,000 square feet factory in Sri Kembangan, Selangor, will expand LKL's capacity as a medical furniture manufacturer specialising in a broad spectrum of products including hospital beds, patient transport trolleys, birthcare tables, medical treatment carts, peripheral support equipment and the fabrication of steel/wooden products.

With an investment of RM16 million, the new factory is expected to be fully operational by end 2012, giving LKL a production capacity over 68,000 items in 2013 compared to 34,000 currently.

Wisma LKL in Sri Kembangan, Selangor

Moving Forward

These EPPs that are working on developing medical devices in the Healthcare NKEA are still very much in their infancy, having only been converted from BO status a year ago. At present, anchor companies have been identified and they have all taken the first steps towards developing nationwide clusters and hubs.

Medical devices are important components of almost all medical procedures, and the sector can stand to gain a lot if the manufacture of the devices can be localised. However, it is important to keep in mind that quality cannot be sacrificed for the sake of localisation. It is the intention of the NKEA to retain quality even as the various hubs ramp up over time.

Moving forward, the EPP teams will continue to find more players to participate in the EPPs as well as continue to improve enablers to help local players move up the value chain.

BUSINESS OPPORTUNITIES

Seniors' Living is the only remaining BO for the Healthcare NKEA after the Medical Devices BO was converted into seven EPPs last year. Malaysia will be classified as an ageing nation by 2020 when 10 per cent of its population will be aged 60 years or older.

The impending demographic shift will spark new challenges for the healthcare sector including issues such as capacity and access, funding for long-term care and the provision of adequate income streams for retirees. These issues raise serious challenges for the future, but they also represent opportunities for growth.

In September 2012, the Healthcare NKEA conducted a Seniors' Living (Aged Care) lab to look at the Aged Care Industry and to develop EPPs that could spur the growth of the industry. This will in turn transform the industry into a recognised part of the healthcare industry, which will also see the development of an ecosystem for senior citizens in high- and middle-income brackets.

The outcomes of the lab were segregated into the workstreams: Retirement Villages, Mobile Healthcare Services and Institutional care.

Delivering care straight to the home

Love On Wheels was part of the Seniors' Living (Aged Care) lab held last September. K.A.S.I.H. (*Kasih Atas Sumbangan Ikhlas dan Hemat*) project is an initiative by Love On Wheels Healthcare Services Sdn Bhd (LOWHS), which provides fully-integrated mobile healthcare services to 2.5 million senior citizens above the age of 60 in the country.

An integral part of the national healthcare system, K.A.S.I.H. bridges the gap in post-hospitalisation care by providing senior citizens with accessible nursing and rehabilitation services. They are assisted in their own homes by certified and qualified healthcare professionals.

K.A.S.I.H. was announced by the Prime Minister on 16 November, 2012, and is currently being rolled out in the Klang Valley. LOWHS is expected to expand nationwide in 2014. This project will require investment of RM68.56 million by 2020.

- **Retirement Villages:** This workstream looks into developing communities for seniors premised on the concepts of active ageing and ageing in place. Potential EPPs from this workstream include the development of retirement villages, high-density residences and even retirement resorts. The integration of age-friendly designs and support services within a retirement village will allow senior citizens to maintain themselves in their own homes even with increasing disabilities.
- **Mobile Healthcare Services:** This workstream looks at the possibility of provisioning care services in the comfort of existing homes. The rollout of such services nationwide will also help improve the turnaround time of hospital beds and lets the elderly recover in their own homes. Currently, Love On Wheels is the first company providing the service that has been announced under this BO.

LOWHS staff pledging to care for you in the comfort of your home, workplace and wherever you will be

- **Institutional Aged Care:** There are presently 15 licensed Nursing Homes and 144 Old Folks' Homes regulated separately by MoH and the Welfare Department under the Ministry of Women, Family and Community Development. Because of this overlap, responsibilities can sometimes be blurred. In addition, there are thousands of unregulated centres that possess varying degrees of standards of care and infrastructure. This workstream seeks to transform this industry by introducing a single standard for nursing homes and old folks' homes called the "Integrated Residential Care Centre" (IRCC). This new standard will be solely regulated by MoH and will provide varying levels of care. There are two initiatives in this BO, one of which is to develop a new IRCC that is equipped with a proper standard and guideline, and another to transform existing care centres into IRCCs by adopting the new standards.

Summary of Healthcare NKEA

	2020 Target
Incremental GNI impact	**35,000**
Additional Jobs	**181,000**

Critical targets for 2013:

- To fully implement SPIKPA, or mandatory foreign worker insurance, in Sarawak. As almost all foreign workers are being covered under this insurance plan, expansion into the East Malaysian will be the next phase of EPP 1
- To draw greater participation in the form of key players and strong champions to participate in the Medical Devices Industry EPPs
- To work on the initiatives under the Seniors' Living BO, and convert them into an EPP as caring for the elderly will see a significant development in 2013
- To commence the registration of unregistered nursing homes and to cultivate the Seniors' Living (aged care) industry
- To review and recalibrate the Malaysian Pharmaceutical EPP
- To assess other potential growth areas within the healthcare industry space

INVESTKL: AT THE HEART OF ATTRACTING MNCS

The InvestKL office stands tall at Kuala Lumpur Sentral, and overlooks some of the most ambitious development projects to be undertaken in the capital under the auspices of the country's Economic Transformation Programme (ETP). While the Government is presently footing the bill for these initial forays into the plan's execution, the private sector is expected to foot up to 92 per cent, or RM1.28 billion, of the bill.

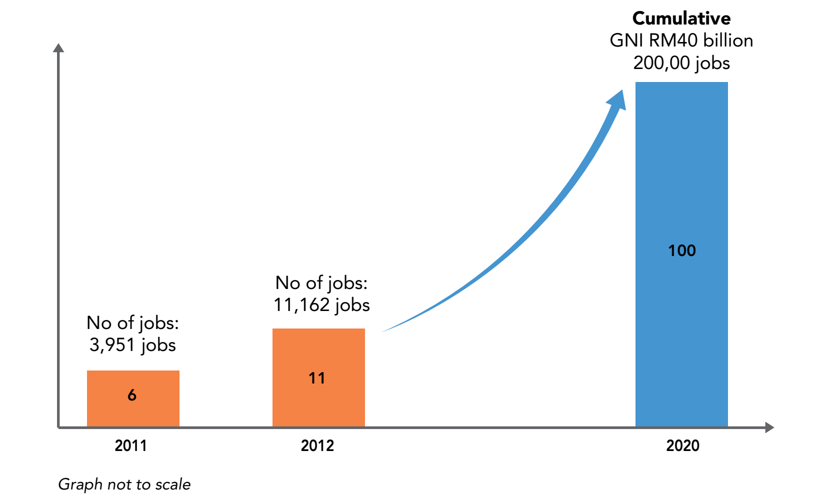
InvestKL's location choice for its office may be coincidental, but the agency is certainly expected to play a central role in bringing foreign multinational companies (MNCs) who will be responsible for a significant portion of these investments. This means bringing in MNCs that will spur talent and income growth, and innovation—no mean task as InvestKL's CEO Zainal Amanshah will attest.

"When we first started InvestKL, MNCs that didn't already have operations in this region just didn't know who Greater Kuala Lumpur was," Zainal says. "We didn't have a 'story' that we could tell. Singapore, for example, had a services-hub story; Hong Kong's was access to China. What's the Greater Kuala Lumpur story?"

The challenge, Zainal adds, was to re-brand the Greater Kuala Lumpur/ Klang Valley (GKL/KV) proposition, which was then mainly known internationally for its manufacturing and shared-services sectors. "We wanted to position GKL as a regional hub for business, innovation, talent and access to Asia," he says. "Investors, wherever they were, wanted to be part of the Asia story."

innovation and supply the talent and resources MNCs needed, and prove that Malaysia was an easy place to do business.

InvestKL Progress – On Track to Attract 100 MNCs by 2020



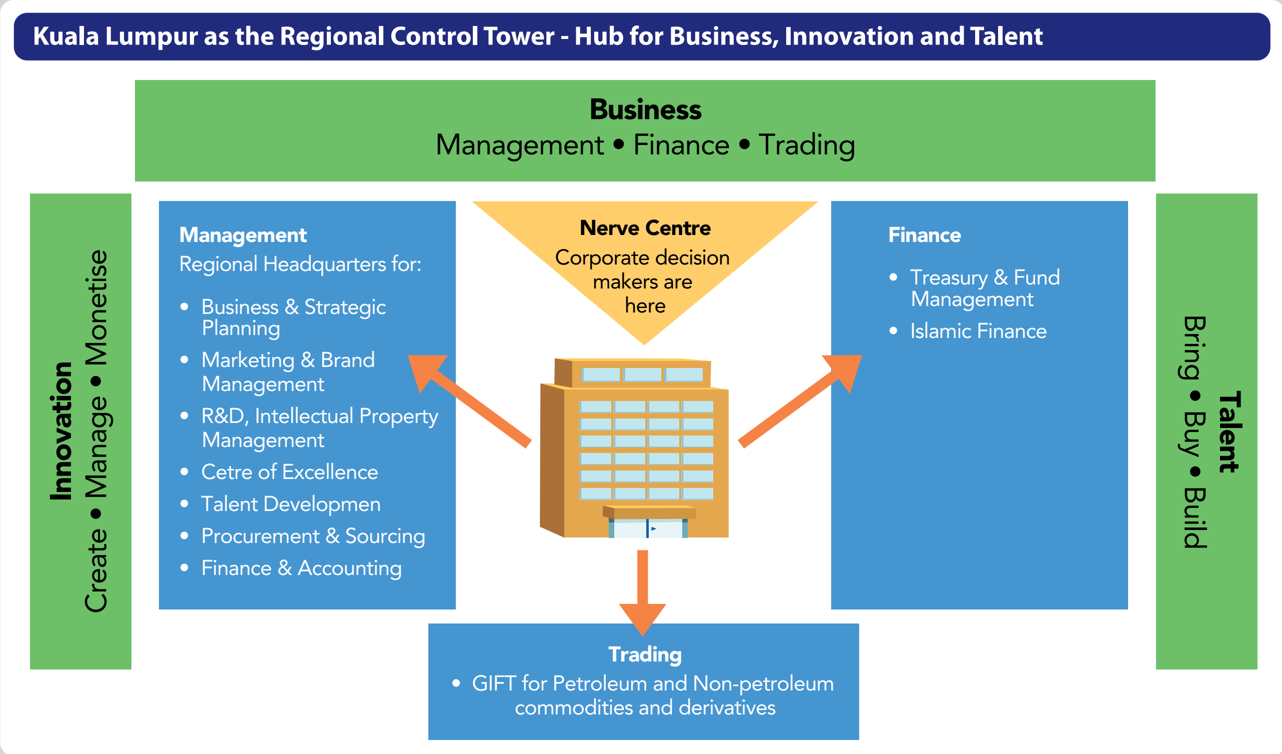
According to the Asian Development Bank's 2011 Asia 2050: Realising the Asian Century report, Asia will capture 51 per cent of global GDP by 2050 assuming current growth levels can be sustained.

That, it turned out, and convincing investors of the GKL/KV brand, would prove to be the biggest challenges for InvestKL in its first two years. How do you convince an MNC with operations throughout Asia that Malaysia, GKL/ KV specifically, was the ideal location for its headquarters?

For Zainal and his team, the challenge lies in showing that GKL/ KV could provide integrated business service solutions, become a hub for

For InvestKL, the timing couldn't be better as both Government Transformation Programme and ETP initiatives had started breaking ground and did much to convince investors that Malaysia was serious about its commitment to transform.

Moreover, reports from independent parties such as The Economist's survey of investment destinations in Southeast Asia is helping put GKL/ KV on the map. GKL/KV, as it turns out, leads the



With the announcement by the Prime Minister in Budget 2013 that the Government will be extending the Global Incentives for Trading (GIFT) programme to non-petroleum based commodities, Malaysia can now position itself as a regional control centre by providing incentives for management, finance and trading.

region in terms of cost competitiveness and infrastructure, and in areas where it lags, i.e. sourcing talent, panaceas are already in place through agencies such as TalentCorp and the Human Capital Development SRI.

But what turned out to be the most effective weapon in Zainal's arsenal was the testimony of other MNCs that have already set up shop in Malaysia. Building relationships and bridges with the Big Four consulting firms and investment banks have also helped as these firms are often hired on an advisory level.

"The MNCs appreciate our close attention to detail," Zainal says. "We are with them throughout the entire consultation process—in assessing the feasibility of GKL/KV, building their business case, talent assistance, identifying incentives, what we can offer: the whole gamut. Because of their help—they are now telling our story for us—it is getting easier to talk to other companies and convince them to come to Malaysia."

InvestKL now has several feathers in its cap including helping bring US-based Darden Restaurants Inc to Malaysia to develop the world's first lobster aquaculture park in Sabah as well as a regional management centre in GKL/KV. The value of that deal has been pegged at RM2 billion.

Over the last two years, InvestKL has brought on board 17 MNCs, mainly in the business services sector. This is a significant progress towards achieving the target of creating 200,000 high skilled jobs and GNI impact of RM40 billion by the year 2020.

Zainal says he is "reasonably satisfied"; 2012 numbers outperformed the annual target of 10 per year although for him, the bigger milestone is to hit 50, or half its mandate, as soon as possible.

"But our work doesn't end there," he says. "Once they (the MNCs) are established in GKL/KV, we are then responsible for helping the MNCs develop their businesses, ensuring that they carry through on the investment commitments they have made, and to also ensure that their investments materialise.

"Our real work starts now."