

Special Supplement with MDBCONNECTS 2018





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HER EXCELLENCY KARIN MÖSSENLECHNER NETHERLANDS AMBASSADOR & CHIEF JUDGE - MISA '18 12 OCTOBER 2018

Dear friends of MDBC,

Once again, the Embassy had the privilege of being closely involved in MDBC's Innovation and Sustainability Awards, MISA '18.

It was a great pleasure to welcome the new Secretary General of the Ministry of International Trade and Industries (MITI), Y. Bhg. Datuk Isham Ishak, as the guest of honour of the Awards evening. And to have had the opportunity to thank YB Dato' Sri Mustapa for everything he has done to support The Netherlands business community and MDBC in his nine year long tenure as Minister of MITI.

The trade relation between The Netherlands and Malaysia is booming. Last year we saw an increase in export from The Netherlands to Malaysia of almost 20%. The export from Malaysia to The Netherlands increased with 22.7%, The Netherlands already being the second largest export destination of Malaysia in Europe, after Germany.

The close economic ties were reinforced by the visit of Dato' Sri Mustapa to The Netherlands in October last year. This visit helped to raise awareness among Dutch companies about opportunities for doing business in Malaysia. The visit was reciprocated in February this year by an incoming mission to Malaysia of Dutch Minister Sigrid Kaag, accompanied by a trade delegation.

As a gateway to Europe and a gateway to ASEAN, The Netherlands and Malaysia

have much to offer to each other. We are both open economies, heavily depending on trade and export, and we both have interest in a functioning, rules based international order. Our trade relation will be reinforced even further if we manage to reopen the negotiations on a Free Trade Agreement between the EU and Malaysia.

The Netherlands and Malaysia also have much to gain from working together in the fields of innovation and sustainability; And innovation in sustainability. Investing in sustainability is now more important than ever.

In December this year, the Katowice Climate Change Conference, or COP 24, will take place in Poland, where governments will meet to review the Paris Agreement on climate change. In the run-up to COP 24, the International Panel on Climate Change (IPCC) presented a Special Report on Global Warming. One of the key messages of this report is that we are already seeing the consequences of 1°C of global warming, among others through more extreme weather, rising sea levels, and diminishing Arctic sea ice.

"With MISA '18, MDBC has provided the local Dutch and Malaysian business communities with an excellent platform to connect and engage with each other, start - ups / scale - ups, government representatives, investors and other stakeholders, and share best practices in the field of innovation and sustainability."

The IPCC report highlights a number of climate change impacts that could be avoided by limiting global warming to 1.5° C compared to 2° C, or more. One relevant consequence for Malaysia would be that coral reefs would decline by 70 - 90% with global warming of 1.5° C, whereas virtually all - over 99% - would be lost with 2° C. Every extra bit of warming increases the risk of long-lasting or irreversible changes, such as the loss of ecosystems.

The world is currently not meeting the climate goals and we all have to step up our efforts to do so. But sustainability is more than this, it is also about people. About better social circumstances, living and working conditions, about improving the quality of life.

Innovation is key to all of this, as is political will. Innovation can best be achieved through an integrated approach with the involvement of governments, businesses, knowledge institutes and civil society. This involves start - ups / scale - ups as well. In order to create a good environment for sustainable innovation, collaboration and sharing ideas and knowledge is central.

With MISA '18 MDBC has provided the local Dutch and Malaysian business communities with an excellent platform to connect and engage with each other, start - ups / scale - ups, government representatives, investors and other stakeholders, and share best practices in the field of innovation and sustainability.

As judges we had to decide on the winners in the categories Best Environmental Innovation, Best Social Innovation, as well as the Best Start - Up / Scale - Up in Sustainable Innovation. This was an extremely difficult task, given the wide range of the contributions and the high quality of the shortlisted candidates.

All of the shortlisted candidates, and in particular the winners, inspired us with the way they are working on a more innovative, sustainable future. I would like to congratulate the winners Digi Telecommunications for Best Social Innovation, Paques Asia Pacific for Best Environmental Innovation, MN Empire for the Best Start - Up / Scale - Up in Sustainable Innovation, and of course HEINEKEN Malaysia for winning the Audience Award.

Let me end by thanking my fellow judges and everyone involved in the preparations of the event. And by congratulating MDBC for the successful organization of MISA '18!

H.E. Karin Mössenlechner Chief Judge MISA '18 and Ambassador of the Kingdom of the Netherlands to Malaysia





THE MALAYSIAN DUTCH BUSINESS COUNCIL INNOVATION & SUSTAIN-ABILITY AWARDS 2018

The seventh edition of the MDBC Innovation & Sustainability Awards (MISA) took place this year on Friday, 12 October at the DoubleTree by Hilton Kuala Lumpur.

This year, MISA focused on organizations working on innovations that make the world a better place; Innovations that tackle social and environmental challenges. MISA also focused on connecting and engaging start - ups / scale - ups, investors, corporates, and other innovators.

The award categories for this year were therefore Best Start - Up / Scale - Up in Sustainable Innovation, Best Social Innovation, and Best Environmental Innovation.

In order to connect the start - ups / scale ups with leading organizations in the field of innovation, MDBC also introduced a portion of the program comparable with the famous "Shark Tank" concept. Shortlisted contestants in the category of Best Start - Up / Scale - Up in Sustainable Innovation were invited to pitch their solutions to these leading organizations. These organizations, in turn, considered the long term growth potential of the presented business concepts.

Event partners for this portion of the day program made rewards available. These rewards ranged from mentoring and fund raising advice sessions with experts, to patenting assistance, or providing office space and facilities. This created a low barrier platform for different stakeholders to connect and engage, helping these start - ups / scale - ups fill any gaps in taking their concept and business model to the next stage.

With increased participation from the wider business community, MISA '18 continues to expand beyond the Malaysian Dutch business community, helping to stimulate healthy competition, increasing knowledge and understanding of innovation and sustainability, create exposure opportunities for participating companies, and provide a platform for organizations to expand their network, both within and outside of the MDBC community.

The lead up to the final day of the competition was filled with eager anticipation for a closely contested battle. The MISA Day Program itself began with an Innovation Forum featuring the following speakers * Dato' Praba Thiagarajah (Group CEO, Basis Bay): Green IT: More than a Social Responsibility

* Jacqueline Wong (Assistant Manager -Sustainable Development Sunway, Sunway Properties): Malaysia's Model, Smart Sustainable City

* Aizuddin Danian (Head - Digital Banking, Standard Chartered Bank): Innovation Integration in the Banking Sector)

Presentations by the speakers were followed by a panel session. The final round of competitions for all categories followed. As always, this final round was an opportunity for audience members to learn about best practices from these innovation and sustainability leaders.

The panel of judges for each category were allowed to pose questions to the finalists in order for them to make an informed decision on the winners. Audience members were also able to ask questions, allowing them to gain a more in - depth understanding of these sustainable innovations, un-









Winners of MISA '18 with VIP guests.

l to r: Prithi Sharma (HEINEKEN Malaysia), Rob van As (Paques Asia Pacific), H.E. Karin Mössenlechner (Chief Judge MISA `18 and Ambassador, Embassy of the Kingdom of the Netherlands), YB Dato' Sri Mustapa Mohamad, Y. Bhg. Datuk Isham Ishak, MDBC Chairman Zainul Rahim, Philip Leong (Digi Telecommunications), and Dato' Marcus Lee Andrew (MN Empire).

derscoring the main purpose of the MDBC Awards Program.

Unique to the Best Start - Up / Scale - Up in Sustainable Innovation category, rewards by the segment partners were presented to the finalists after their presentations. These rewards will help them on

the next step of their journey in developing their business.

After the completion of the day program, attendees enjoyed a cocktail reception before moving into the ballroom to begin the Awards Ceremony & Dinner featuring the announcements of the MISA '18 winners. Those that missed the day program portion of MISA were also able to learn about the shortlisted finalists and the projects they submitted. This was done during the elevator pitch portion of the dinner during which each finalist had sixty seconds to summarize their project. Attendees were then able to conduct a live vote to choose

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MDBC Chairman Zainul Rahim with YB Dato' Sri Mustapa Mohamad and MDBC Executive Director Marco Winter.

the winner of the MISA Audience Award.

Also part of the formalities that evening was a special thank you and farewell to MDBC Patron, YB Dato' Sri Mustapa Mohamad, former Minister of International Trade and Industry. Dato' Sri Mustapa has been the Patron of MDBC for nine years. He has always been a strong supporter of the Council and has been involved in a number of MDBC led events and activities, helping to encourage bilateral trade between Malaysia and The Netherlands.

We thank Dato' Sri for all of his years of hard work and leadership at the Ministry, and for his support of MDBC along the way. We wish him all the very best in his future endeavors. MISA '18 category judges also took to the stage throughout the evening to introduce each category and read the judges report on the winners, highlighting the points that helped each winner rise above the rest.

Winners of the MDBC Innovation & Sustainability Awards were announced by VIP guest Y. Bhg. Datuk Isham Ishak. Additional information on each of these winners and their projects is available in this supplement.

Short summaries on the projects submitted by other finalists have also been made available so that those who did not have a chance to attend the event can still learn from these innovation and sustainability champions.

MDBC would like to thank all of the competitors who took part in this year's Awards Program, helping to strengthen the program as a knowledge platform for the business community through the sharing of best practices.

MISA will be back again in 2019 so keep an eye open for the award categories as they change every year. We look forward to seeing you there!







Top: The inaugural MDBC Awards Program in 2011, celebrated in conjunction with MDBC's 15th anniversary. Right and opposite page, a variety of photos from Award Program editions from 2011 to 2017.

MDBC first started the MDBC Awards Program in 2011 as part of the 15th anniversary celebrations. It was conceptualized as a way to showcase the success stories found within the MDBC community, specifically in the field of sustainability, hence its beginnings as the MDBC Sustainability Awards (MSA).

Over the years, MDBC has continued to grow and evolve the awards program and in 2017, renamed it into the MDBC Innovation & Sustainability Awards (MISA). The renaming reflected MDBC's own understanding of the integral part that innovation plays in sustainability.

Created to acknowledge, showcase, honor, and reward the outstanding Best Practices of companies in the areas of sustainability and innovation, it has since grown and by opening up to submissions from all (members and non - members alike), it now provides the best platform to highlight the achievements and ongoing developments by both Malaysia and The Netherlands in sustainability, innovation, and the circular economy.

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MISA is MDBC's unique and innovative platform, nurturing an accelerated development and understanding of innovation and sustainability. It is also a celebration of the successes and an acknowledgement of the hard work that companies have put into the advancement of these two fields.

With different categories up for competition every year, the MDBC Awards Program has covered a wide variety of topics over the years. It allows different companies, with a variety of specializations, the opportunity to showcase different areas of expertise and help further the development and understanding of innovation and sustainability.

To learn more about each individual year, categories, judges, shortlisted, and winners, please visit https://www.mdbc.com. my/mdbc-awards-program and select 'History of the MDBC Awards Program'.

Videos covering both day and evening programs from previous years are also available for viewing online at https://www. mdbc.com.my/information/the-library/videos.













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MISA HISTORY



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JUDGES

MISA '18 JUDGES

We are very proud to present you with the MISA



CHIEF JUDGE



HER EXCELLENCY KARIN MÖSSENLECHNER

Ambassador, Embassy of the Kingdom of the Netherlands

The Ambassador started her diplomatic career in 1997. She has held postings in The Hague, New Delhi, and Berne. From 2010 - 2011, she was Assistant Director for European Integration at the Ministry of Foreign Affairs in The Hague. She then went on a transfer to the Royal Netherlands Football Association (KNVB), where she worked as the Coordinator for Security Policy and Public Affairs, as well as Deputy Competition Leader for the Dutch Premier League. She was back at the Ministry of Foreign Affairs as the Deputy Director Security Policy (and coordinator for MH17), before being posted here in 2016.

BEST START - UP / SCALE - UP IN SUSTAINABLE INNOVATION







MATT VAN LEEUWEN

Director - Innovation & Commercialisation, Sunway University

Matt has significant entrepreneurial experience with start – ups. He was cofounder of Simugen, Camtech, and Science Bridge Academy. Previously, he was a Commercialisation Specialist in PlaTCOM Ventures. Matt trained at the University of Cambridge (UK) and the University of Utrecht (The Netherlands).

AZMAN HASSAN

Vice President, PEMANDU Associates

Azman's work utilises the Big Fast Results (BFR) Methodology and he was involved in cabinet level prioritisation workshops, problem solving labs, enabling implementation through capacitating and coaching, and transforming national and sub – national delivery offices. Prior to PEMANDU he was with a Fortune 500 MNC.

2018 panel of judges. As always, the panel of judges consists of highly regarded, independent expert individuals.



BEST SOCIAL INNOVATION

FREDA LIU

Producer / Presenter - Enterprise, BFM

Freda has conducted over 5,000 interviews with some prominent names including author Stephen Covey, motivational speaker Nick Vijucic, former GE CEO Jack Welch, the Duke of York HRH Prince Andrew, and Wikileaks founder Julian Assange. She has been with BFM since its inception in 2009.

MICHAEL WARREN

Director - Strategy, Advisory & Services, InvestKL

Michael brings with him over 30 years of corporate leadership and management experience mainly in Asia Pacific countries. He has been instrumental in pioneering the start – up, operations, and restructuring of entrepreneurial, regional, and MNCs across a variety of industries.







BEST ENVIRONMENTAL INNOVATION

TIMOTHY ONG

Senior VP - Strategic Impact Projects, Agensi Inovasi Malaysia

Timothy has led the development of State level biomass development action plans for Sabah and Sarawak. He works with foreign governments to engage them in biobased projects and is an active member in United Nations – FAO Working Group on Sustainable Bioeconomy Policies and Strategies.

MELISSA SANDHU

Marketing & Communications Director, Basis Bay

Melissa was an early adopter of practical change and purposeful collaboration, her 17 years of marketing and communications experience sees her spearheading Green initiatives from across a diverse range of industries internationally.







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Selangor is the most developed and progressive state in Malaysia. It is the country's primary port of entry and strategically located around the capital city, Kuala Lumpur.

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l to r: H.E. Karin Mössenlechner, Y. Bhg. Datuk Isham Ishak, Prithi Sharma (HEINEKEN Malaysia), and MDBC Chairman Zainul Rahim.

The winner of the MDBC Innovation & Sustainability Awards (MISA) 2018 Audience Award was HEINEKEN Malaysia. HEINEKEN Malaysia operates the Sungei Way Brewery which began operations in 1965. Located in Selangor, the brewery occupies a land area of 23,72 acres and is the first brewery in Malaysia to receive the MS 1480:2007 Hazard Analysis Critical Control Point (HACCP) Certification from the Ministry of Health in August 2002. The brewery received the ISO 9002 Certification in 1995 from SIRIM, upgraded to MS ISO 9001:2008 in 2010, and subsequently to ISO 9001:2015 in 2018.

Listed on the Main Market of Bursa Malaysia, HEINEKEN Malaysia's principal shareholder is GAPL Pte Ltd based in Singapore. GAPL Pte Ltd is 100% owned by Heineken N.V.

HEINEKEN Malaysia's Working Actively Through Education & Rehabilitation (W.A.T.E.R.) Project is a collaboration between the SPARK Foundation (the CSR arm of HEINEKEN Malaysia Global Environment Centre (NGO), government agencies, and communities. It aims to empower communities to safeguard the quality of rivers and protect water resources through community based programs.

In the last 10 years, HEINEKEN Malaysia has invested RM 8 million in outreach programes, established 12 active river care communities along six rivers, and engaged 30,000 Malaysians in river rehabilitation.

W.A.T.E.R project is the first - of - its - kind in Malaysia, where HEINEKEN Malaysia complemented their river rehabilitation efforts with community participation to educate and change mindsets by using a two - pronged approach. Infrastructure - physical initiatives directed at the rehabilitation of the river, Education- activities to create greater ownership of the river by various stakeholders. These activities help to change mindsets and create greater participation from stakeholders in addressing river issues.

Since 2007, six rivers in Malaysia were adopted. HEINEKEN Malaysia organised engagement programmes for local and business communities, government agencies, and youths, engaging more than 30,000 Malaysians. The programme has been sustained till today by 12 active river care communities nationwide.

Milestones:

2007: W.A.T.E.R Project Selangor launched in Sungei Way

2009: Water Quality in Sungei Way improved from Class IV - V to Class III 2013: Extended W.A.T.E.R Project to Perak based on the success in Selangor in river quality. Three tributaries of Sg Kinta - Sg Senam, Sg Buntong, and Sg Kledang. Effective 2018, we have established award winning Youth River Rangers who will sustain the project in Perak.

2015: Expanded W.A.T.E.R Project Selangor to Sungai Penchala, which is 20 times longer than Sungei Way

2017: Built rainwater harvesting systems in three villages in East Malaysia, benefitting 2,300 villagers.

2018: Committed RM 2.5 million on Water Stewardship Agenda till 2020, targeted at Sungai Selangor, Sungei Way and Sungai Penchala.

Criss - crossed by over 3,000 rivers, Malaysia is a country where more than 90% of the raw water supply comes from streams and rivers. Unfortunately, only 47% of Malaysian rivers remain clean (Department of Environment, 2016). If we don't col-

HEINEKEN

lectively change the current levels of water pollution and consumption, we will face water scarcity in the near future, as early as 2030 according to UN Environment.

Protecting natural water sources and ensuring a steady supply of drinking water for Malaysians has therefore been a key priority of the SPARK Foundation, the corporate social responsibility arm of HEINEKEN Malaysia.

When they first started in 2007, the communities were not supportive of the cause. Through consistent engagement, HEINEK-EN Malaysia eventually saw local communities taking ownership as they witnessed real changes in the environment. These communities have sustained river water quality from 2009 – 2017 and have won national awards for four consecutive years in Selangor on river conservation efforts.

HEIENKEN Malaysia has also empowered business communities and helped reduced food wastage by 18% within a year in one of the project sites. They have worked with more than 56 government agencies, educational institutions, non - profit organisations, and 136 local communities along five rivers in Malaysia. It is proven that through strategic partnerships and initiatives, results can be achieved and sustained for a better environment.

Protecting water resources is HEINEK-EN's global sustainability focus area. They use water throughout their supply chain – from growing crops to their finished products. Beer is 95% water so it is a critical resource for their business.

'Water stewardship' is how HEINEKEN describe the approach to conserving water. It covers reducing the water they use in their breweries, treating the water they discharge back into the environment and balancing the water they don't put back in the environment by investing in water stewardship projects.

In Malaysia, the W.A.T.E.R Project by HEINEKEN Malaysia is pioneer and the first to start the private public partnership with non - government and government agencies to rehabilitate rivers and to conserve water.

SHORTLISTED COMPANIES

BEST START - UP /

SCALE - UP IN



SUSTAINABLE INNOVATION

THE SHORTLIST



ABMANAN BIOMEDICAL SDN BHD

The Haruan Channa Striatus is a freshwater indigenous species of fish and is traditional medicine used for quick recovery after giving birth. The medicinal value is the key in the development of Haruan's extract, known as Haruan Manan (HM), a very promising and high potential natural product active pharmaceutical ingredient (API). All activities are done in a holistic way, maintaining sustainability in an environmentally friendly ecosystem. Abmanan Biomedical Sdn Bhd (ABSB) is continuing R&D, manufacturing, and commercialization of the Haruan Biomedical Product (HBP), known to help with wound healing, pain reduction, reduction of inflammation, and growth inhibition for pathogenic bacteria including Stphylococcus aureus and Helicobacter pylori. ABSB has produced a Haruan personal care line comprising of shower gel, lotion, and Haruan Cream. Each contains 1% of HM, except for the cream which contains 5%. The Haruan cream is also medicated to treat skin diseases (proven through a randomized clinical trial evaluating safety and efficacy). Haruan Tonic, Tablets, and Capsules are also in the development pipeline. All HBP are natural, non steroidal, and Halal certified.



MIKEBIKES

Tourists and employees of companies can explore and experience Kuala Lumpur on bicycles under guidance. This green and active way of transport exists in all capitals of the world. The routes are made in collaboration with Cycling KL, who has mapped cycle friendly back alleys and streets in KL. MikeBikes connected this with heritage and interesting places. Facilitating local companies and tour guides to offer daily packages with a group of high visible clients to increase, in a safe way, awareness of motorized traffic participants.

Guided cycle tours are a novelty for Kuala Lumpur. Our priority 'safety first' has led to a concept that is made and executed by locals in particular. The Tourism Masterplan KL 2015 - 2025 describing 'green transport' and 'sustainability' has been carefully studied and taken as a guideline for MikeBikes' strategy. Tourists with cycle experience who cycle daily as a group, guided by tourist guides and marshalls (unlicensed), can change (in a safe way) the awareness of the current traffic participants.





THE SHORTLIST



MALAYSIA INSTITUTE FOR

SUPPLY CHAIN MANAGEMENT

This project by the Malaysia Institute for Supply Chain Management (MISI) aims to increase the independent small holder palm oil farmer's livelihood through a logistics optimization model primarily focused on the transportation function across the supply chain. In addition, it aims to keep these independent small holder farmers, or ISHFs, relevant in the supply chain by endorsing sustainability. It will create a new market space for technology based solutions to track the on – farm and off – farm activities in alignment with the transportation function.

The implementation of a logistics optimization model will incorporate syncing with the harvesting schedule at the farm level and with the demand for fresh fruit from the collection centers at the mill level. Reducing travel time will reduce the usage of fuel consumptions and emissions. This model can help ISH to plan their harvesting time and improve the quality of FFB by the faster delivery at the right time. It will also add motivation for certification by increasing the harvest yield by reducing fruit loss.



BEST START - UP / SCALE - UP IN SUSTAINABLE INNOVATION CONTINUED

SHORTLISTED COMPANIES



BEST SOCIAL INNOVATION

THE SHORTLIST

ARCADIS MALAYSIA SDN BHD

Deep Orange is a global co – creation and innovation program hosted by Arcadis in Malaysia and co – hosted with InvestKL to address key issues around affordable housing, mobility, and construction safety with the ultimate goal of improving liveability in Kuala Lumpur. The program brought together a diverse range of stakeholders across Kuala Lumpur and the globe to design for success and solve issues with innovative solutions in a four – day design sprint applying the framework of design thinking.

This initiative is the first of its kind in the AEC (architecture, construction, and engineering) industry and is a unique approach to solving complex issues that impact our future cities. Deep Orange addressed critical issues currently faced by KL around housing, mobility, and construction safety with over 20 stakeholders. Arcadis continues to implement these solutions with the team - all with the shared ambition of creating a stronger, sustainable city that continually improves the quality of life for its people.



MAKE IT RIGHT MOVEMENT

Founded in 2015, MIRM is the CSR initiative of Brickfields Asia College, IACT College, and Veritas University College which collectively make up the Brickfields Asia College Education Group. MIRM supports over 200 charity and CSR related projects annually, involving staff and students whenever possible. MIRM seeks to support and empower internal stakeholders and the community at large via fund raising management, capacity building, strategic planning, project management, and social media management.

MIRM leverages on the students and faculty of the BAC Education Group to create a holistic, rounded, and skilful student that is market ready and highly employable. The BAC Education Group students are immersed in real life projects and learn the soft skills needed in a work environment. These include project management, event management, public relations, social media, inter cultural understanding, organisational development, and community development, also ensuring the application of their academic theory in 'real life'.





BEST SOCIAL INNOVATION

THE SHORTLIST



SHELL MALAYSIA LIMITED

#MyGeekMovement supports the Malaysian government's agenda of developing more youths into future engineers and scientists, strengthening Malaysia's capability to be an international leader in technology. By embedding interest in sciences amongst 225 lower secondary school students nationwide, the program expects these students to pursue careers in science disciplines. #MyGeekMovement does this by immersing these students into the world of science, technology, engineering, and mathematics (STEM) through STEM education tools such as the Arduino platform and Google app development.

Beyond the provision of STEM education tools, the program positions lower secondary school students to identify a problem within their environment and develop a solution for it as a team. The teams compete at school level and at regional competitions before competing to be the national champions. As a reward, the winning team not only gets a cash prize for their hub, but they enjoy a STEM centric learning trip to Shell's Make the Future Festival.





BEST ENVIRONMENTAL INNOVATION

THE SHORTLIST

Expleco has developed compact glass bottle crushers for the hospitality industry and now sell their glass to sand solution in more than 60 countries. They give customers in remote locations an opportunity to take control of their own glass packaging waste and put the by – product to meaningful use.

In Malaysia, Expleco is helping to reduce the volume of glass packaging going to landfills and giving establishments a meaningful use for the bi - product in markets where the value of glass cullet is too low, or facilities too far, to create closed loop recycling models where the glass can be used to remake packaging. In most cases, their equipment pays for itself in operational savings in less than a year, and often much faster in areas where waste collection and recycling is costly. Now, Expleco diverts more than 32,000 tonnes of glass bottles from landfills each year.

HEINEKEN MALAYSIA

HEINEKEN

W.A.T.E.R (Working Actively Through Education & Rehabilitation) Project is a collaboration between SPARK Foundation, CSR arm of HEINEKEN Malaysia Global Environment Centre (NGO), government agencies and communities, which aims to empower communities to safeguard the quality of rivers and protect our water resources through community-based programmes. In the last 10 years, we have invested RM8 million in outreach programmes, established 12 active river care communities along six rivers, and engaged 30,000 Malaysians in river rehabilitation.

The program is sustained today by 12 active river care communities nationwide. HEINEKEN pursues a holistic approach to sustainability through the 'Brewing a Better World' strategy, where protecting water resources is one of the six focus areas they commit to making a difference. Their sustainability approach ensures that they use water efficiently onsite and have strategic initiatives and partnerships in place to protect water sources beyond their business.





BEST ENVIRONMENTAL INNOVATION

THE SHORTLIST



SIME DARBY RESEARCH

Zero Discharge Technology, a game changing innovation features an advanced membrane filtration and oxidation technology for palm oil wastewater treatment, enabling production of recyclable water. Additional revenues are generated through recovery of oil from liquid waste stream and eco – biosolid production. This project, inspired by the World Sustainable Development Goals (SDG), is one of the company's initiatives in making its operations more sustainable and environmentally friendly. This innovation not only resolved issues related to waste water produced in a palm oil mill, it also generated additional revenue. Normally, mills need to have a huge ponding area to treat the waste water. These pond areas produce a bad smell if not taken care of properly. This innovation features an advanced membrane filtration and oxidation technology for waste water treatment, enabling production of recyclable water. Furthermore, additional revenue is generated through oil recovery and eco - biosolid products. This is the first time they have been able to achieve a state of zero discharge - no liquid and solid discharge.



MOEC

CHAMPIONING MALAYSIA'S DIGITAL ECONOMY

We are MDEC, the Malaysia Digital Economy Corporation.

We champion the Malaysia's digital economy. Our role is to build a vibrant digital economy and ensure that Malaysia plays a leading part in the global digital revolution. We are passionate about digital technology and its potential to transform the future of our nation and the world.

MDEC. Connecting businesses and people to their digital future



MN Empire representatives on stage receiving the MISA '18 Best Start - Up / Scale - Up in Sustainable Innovation Award from Chief Judge H.E. Karin Mössenlechner, VIP Guest Y. Bhg. Datuk Isham Ishak, MDBC Chairman Zainul Rahim, and category judge Matt van Leeuwen.

MN Empire is Malaysia's first solar powered mosquito eliminator, and they are the winner of the Best Start - Up / Scale - Up in Sustainable Innovation category of MISA '18.

With the number of dengue cases rising every year in Malaysia, MN Empire strongly believes that the dengue issue needs to be tackled through a more creative, innovative, and integrated method. The common mosquito trap found in markets are only designed for indoor use and will only trap adult mosquitoes.

This means that the Aedes mosquito, carriers of dengue fever, can still breed in housing compounds. The Aedes mosquito numbers have increased in the past two to three decades worldwide and is considered to be among the most widespread mosquito species.

Previously, insect repellants containing DEET or p - methane - 3 were effective in repelling the Aedes mosquitoes. This did nothing however, for the actual reduction of Aedes mosquitoes. Additionally, concerns and bans on the use of DEET in insect repellents due to health concerns meant that a solution still needed to be found.

In order to reduce dengue cases, it is important to prevent mosquito breeding and hatching. MN Empire invented a solar mosquito eliminator device designed to kill both adult and immature mosquitoes. They see a big market opportunity in Southeast Asia as well as other tropical countries.

Since the Aedes mosquito is primarily an urban dweller, it prefers to breed and live around human habitation, mostly outdoors. The female mosquito bites for blood, which she needs to mature her eggs. MN Empire designed the first outdoor mosquito eliminator; it is solar powered allowing it to operate 24 hours a day while staying eco - friendly.

The device contains an LED that produces a special light frequency to attract all types of mosquitos and flying insects towards the device. These mosquitos and insects are



then electrocuted by electric mesh. It also contains an organic liquid, also known as Aedes Aids Liquid, which helps to attract female Aedes mosquitoes to lay eggs that will not hatch. This "Lure and Kill" technology is validated by the World Health Organization (WHO). The device will blend into typical houshold landscape decor and acts as a decorative lamp, encouraging higher chances of market adoption. The device is low maintenance, easy to install, and odour free. It helps enhance the landscape while protecting people from dengue.

The MN Empire range of products are solar powered, have a light sensor, electric zapper, are waterproof, rechargeable, have a monitoring system, and lure and kill mosquitoes.

As a start - up, MN Empire wanted to participate in MISA to help bring visibility, credibility, and funding to help bring their product to the new level. After four years of research and development, MN Empire launched its first product back in 2017. They have managed to sell over 1,000 units but their ultimate goal is to expand from business to consumer, and commence business to business sales.



BEST SOCIAL INNOVATION



l to r: H.E. Karin Mössenlechner, Philip Ling (Digi Telecommunications), YB Dato' Sri Mustapa Mohamad, Y. Bhg. Datuk Isham Ishak, Zainul Rahim, and Michael Warren (MISA ۱۵ Judge)

Digi Telecommunications is a mobile connectivity and internet services provider. With a strong legacy of product and services innovation, Digi's ambition is to become Malaysians' favorite digital life partner, providing relevant, personalised, and engaging digital services that will enable all Malaysians' digital lifestyles, experienced on their 4G + network.

Listed on Bursa Malaysia, Digi is part of the global telecommunications provider Telenor Group and is a leader in driving progressive and responsible business practices.

Digi won in the Best Social Innovation category for their "Yellow Heart for Safer Internet" program. Yellow Heart is committed to keeping families safe through responsible digital usage and nurturing digital citizenship behavior among children.

With more children accessing the internet at an early age, many have admitted to not being equipped to recognize cyber risks and to act accordingly with confidence. Yellow Heart provides engaging and interactive education to build digital resilience towards these risks. It also works through partnerships to provide access to support systems for children.

Yellow Heart's innovation is seen in the aspects of holistic solutions and engaging delivery to achieve impact.

Digi partners experts (e.g. CyberSecurity Malaysia and UNICEF) to create educational resources for children to identify cyber risks (e.g. cyberbullying, cybergrooming) and build digital resilience towards these negative encounters. Through partnerships with the Royal Malaysian Police, MCMC, Childline International, and Protect and Save the Children, Digi provides access to free helplines and support systems.

To date, Digi has organized workshops to train more than 7,000 schools and half a million students. Their resources and solutions are created based on real life scenarios of online risks encountered by children.

Digi's content has been delivered through platforms that attract and interests children to learn more about the issue. Some of these platforms include:

- Digital Universe at Petrosains Discovery Centre (an interactive technology showcase around internet risks and digital citizenship);

- Yellow Heart Cyber Series, an educational series on internet safety alongside a nationwide school competition;

- Youth focused nationwide townhalls (SayaSayangSaya) where children are given up to two hours to asks a panel of experts questions around online harassment, sexting, pornography, and cybergrooming. This also leverages on key celebrity influencers.

Malaysia has the fourth highest digital natives in the world, with more than 93% of Malaysian children having access to the internet. The social issue of child online sexual exploitation is a major concern for Malaysia as it has the highest number of IP addresses uploading and downloading photographs and visuals of child pornography in Southeast Asia.

Cyberbullying is another issue that is of growing concern as 33% of children in Malaysia are vulnerable to cyberbullying. The concern also lies around increasing cyberbullying behavior amongst youths as research indicates that most (53.5%) of teens have moderate to high tendencies of being a cyberbully, rather than a victim.



Digi believes that there is a high impact with their innovative approach as many of their solutions are based on real life scenarios, easily relatable by young people as they have also intentionally included them in the process of developing these solutions for their peers.

Through their efforts, Digi has brought together international agencies such as UNICEF and Childline International, government bodies such as the Ministry of Education and CyberSecurity Malaysia, local authorities (Royal Malaysian Police), media (R.AGE, and The Star), and NGOs to combat these issues together. These alliances have enabled Digi to work together to enact laws (e.g. Child Sexual Bill), international best practices, high level discussions (e.g. YouthTalk), and grassroots engagements (e.g. training of school teachers and workshops for students). Digi believes the ongoing and sustainable efforts will allow them to reach all five million children in Malaysia. Their programs are also run internally to educate and empower their employees with the same resources, allowing them to engage with their own communities.

Digi believes in being a responsible provider of the internet, where they go beyond profit to ensure their customers and their families are kept safe and empowered while accessing their services. With this new innovation (Digi is the only telco in Malaysia that has spearheaded a child online safety program), Digi has been recognized as an industry and international leader (recognized by UNICEF as the first Mobile Operator in the world to implement Child Rights Self Impact Assessment).

Through strong partnerships and innovative engagement methods, Digi has provided education through various channels and multiple platforms for effective engagement with the youth. Digi co - organized the ASEAN Child Online Protection Camp during the ASEAN Child Online Protection Malaysia Seminar 2018 with MCMC and UNICEF. They are recognized by international organizations such as Childline International, UNICEF, and INTERPOL as the leading operator championing these issues in Southeast Asia.



l to r: Rob van As (Managing Director, Paques Asia Pacific Sdn Bhd), H.E. Karin Mössenlechner, YB Dato' Sri Mustapa Mohamad, YBhg Datuk Isham Ishak, and Zainul Rahim.

Winner of the Best Environmental Innovation for MISA '18 was Paques Asia Pacific Sdn Bhd. This second generation Dutch family owned business is one of the leading players in water and gas treatment. For over 30 years, Paques has helped industries reduce water and carbon footprints and reclaim valuable resources.

Paques has a high focus on innovation and continuously develops new treatment systems to address new challenges. With dedicated research and development centers in The Netherlands and China, Paques remains a leader in the field of water and gas treatment.

Even though 70% of the earth's surface consists of water, only 1% of this immense quantity is fresh water and available for human consumption and use. A growing world population, the changing climate, and the demands for a higher standard of living only intensify the pressure on already scarce resources. Therefore, integration of water purification, sustainable energy generation, and reuse of resources is becoming more and more essential in production processes.

By 2020, the Malaysian Palm Oil Industry needs to capture all Biogas to prevent emissions of CO2, helping to keep the environment clean and contribute in the fight against global warming. Biogas can be used as a power source to fuel engines, boilers, or to convert to CNG.

The problem however, is that Biogas can be highly toxic and corrosive due to the H2S content in the methane. By applying the Thiobacillus (a sulfur oxidizing bacteria) in the Paques Thiopaq[®] system, biogas from the Palm Oil industry can be cleaned and used as a power source in a safe manner. Paques Asia Pacific submitted their project on introducing this system to the Malaysian Palm Oil industry and proving its advantages.

The Paques Thiopaq[®] system is a sustainable biological treatment system. The Thiopaq cleans the toxic gas in biogas before being utilized in engines, boilers and / or released to the environment.

The Thiopaq system can regenerate / recover back caustic during the upgrading process of the biogas. The system regenerates more than 95% of this spend caustic which translates to big saving costs for Thiopaq users when compared with old conventional (chemical) systems.

Lower caustic consumption leads to less harm being done to the environment as the risk of leaks and spillage are also reduced. This system therefore has very favorable operational expenses using biotechnology instead of dosing with a lot of chemicals. Companies that operate the Thiopaq system are able to save significant amounts of operational expenses due to lower caustic consumption.

When the caustic is regenerated, Bio - Sulphr is produced as a by - product. This by - product can be used as fungicide or fertilizer. The Bio - Sulphur produced by the Thiopaq system can also be sold separately and used as an extra income source for the company. This makes the Thiopaq system a truly circular solution.

Uncontrolled emission of biogas into the air is devastating as it causes harm to the environment due to the greenhouse effect (methane CH4) and pollutes surfaces water and ground water at the same time. Currently, the majority of Palm Oil Mills in Malaysia still practice this uncontrolled emission by treating their Palm Oil Mill Ef-



fluent (POME) in open ponds and lagoons.

This process is a cheap but environmentally unfriendly, and even dangerous way of getting rid of the Palm Oil Mill waste water and biogases produced in these ponds and lagoons. Paques' Thiopaq technology (in combination with Paques' Biopaq Technology) can solve this environmental problem in a sustainable way, utilizing biotechnology and capturing all of the biogas while purifying waste water and cleaning biogas.

With the purified biogas being used as an alternative energy source for the factories, replacing natural gas or electricity, energy costs will be much lower and a significant reduction of operational expenses can be seen. In cases where Bio - Sulphur (the by - product of the Thiopaq operation) is produced in large quantities, this Sulphur can be sold to the Fertilizer industry as it makes very good and biological fertilizer or fungicide.

Presently, Paques is building a full scale demonstration plant in Pahang at Dominium Square LPPK, a Palm Oil Mill within the Malaysian Palm Oil Board (MPOB) association to help prove the viability of the Thiopaq system in Malaysia. The Thiopaq system is proven technology on biogas, but it is still new to the Palm Oil industry. At Indah Water Consortium (IWK) in Kuala Lumpur, a Thiopaq installation is running on the biogas produced by IWK digesters.

Thiopaq technology has been a major contributor to the utilization of green energy coming from Biogas. Before this invention, Biogas would just be burned and flared off to solve the problem of toxicity and corrosiveness. Now, Biogas can be treated and used, saving costs for the inidustry and helping industries to meet their environmental targets.

The technology (discovered at Wageningen University by Prof. Cees Buisman and team, and made into a product in cooperation with Paques) has also boosted further research towards more bio technological solutions for environmental problems, such as the removal of ammonia from waste water by the anammox bacteria.



The Basis Bay Sustainable Cloud







Technology Lifecycle Management



IT Infrastructure Optimisation



Smart Procurement



Green IT Best Practices

