DIGITAL PULSE
A SPOTLIGHT ON THE DIGITAL HUB OF ASEAN

MDEC | **MD** MALAYSIA DIGITAL

XSOLLA: TAPPING INTO THE US$200 BILLION VIDEO GAME MARKET THROUGH LARGEST GLOBAL OFFICE IN KUALA LUMPUR

MDEC Propelling Sustainable Advances in Digital Economy

Strengthening the Bond between Microsoft and Malaysia

Metaverse Shows Resilience Despite Setbacks from Major Tech Companies

Uncover the Future of the Skies with the Possibilities of Autonomous Drones

ABOUT MDEC

ABOUT MALAYSIA DIGITAL ECONOMY CORPORATION (MDEC)

Malaysia Digital Economy Corporation (MDEC), a government agency under the purview of the Ministry of Communications and Digital, was established in 1996 to lead Malaysia's digital economy. Beginning with the implementation of the MSC Malaysia initiative, we have since then catalysed digital transformation and growth all over the nation. By offering greater incentives and governance for growth and re-investment, we aspire to bolster Malaysia's status as the digital hub of ASEAN, opening new doors and driving shared prosperity for all Malaysians.

Malaysia's central geographical location in ASEAN, its young and digitally-savvy population, multicultural and multilingual tapestry, easy access to capital and regional markets, ease of doing business, certainty of business operating environment and legal system, comparative value and high standard of living, makes it the natural choice to land and grow your digital business here.

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FOREWORD

TS. MAHADHIR AZIZ,
CEO of MDEC

"THE BEST WAY TO PREDICT THE FUTURE IS TO CREATE IT."

THE quote above by Peter Drucker suggests taking proactive action to shape our future rather than passively waiting for it to unfold, which resonates with MDEC's relentless pursuit of collaborative work in sustainable technology partnerships and across the digital economy scene.

In today's rapidly evolving world, the digital economy has emerged as a powerful force driving growth and transformation across industries. As Malaysia charts its course towards a thriving future, it is imperative that we fully embrace the opportunities presented by the digital era.

In this issue of Digital Pulse, MDEC had the pleasure of having an in-depth conversation with Xsolla. This aspiring company is moving to dominate the Southeast Asian gaming market. Xsolla highlights the stable growth and huge interest in the gaming market as an opportunity to spread its wing through local partnerships and recruitment of Malaysian talents.

The digital sphere is actively searching for more collaborations as like-mindedness in the industry can ensure innovations and technology accessibility for economic development. Microsoft and MDEC have been inseparable in this aspect, constantly establishing a safe digital ecosystem and improving forward as the demand for data centres grows. With Microsoft's data centre region set in the country, it will bring in more motivation to progress better.

We also look into the commitments in assimilating metaverse with the industries, positively contributing to the digital economy efforts. Along with this, Malaysia's initiative with Premier Digital Tech Institutions (PDTIs) is also highlighted, where it aims to produce high-quality graduates for digital tech-based jobs aligned with the fast-growing technology usage across the nation.

The digital economy requires companies to prioritise the environment and equip their workforce with the necessary tools. MDCAP, a collaboration between MDEC and UNGCMYB, focuses on the importance of sustainability in the digital economy and taking meaningful steps to mitigate its environmental impact.

This issue provides you with valuable information that will ignite your passion for investing and understand this vibrant nation's investment landscape. Reach out to us today! Happy reading.

XSOLLA: TAPPING INTO THE US$200 BILLION VIDEO GAME MARKET THROUGH LARGEST GLOBAL OFFICE IN KUALA LUMPUR

In a conversation with Digital Pulse, Chris Hewish, President of Xsolla, discussed the booming gaming industry in Malaysia and the company's decision to expand into Asia. Discover the exciting opportunities in this growing market and the latest developments in the global gaming industry

The global video game market is estimated at over US$200 billion this year, and Malaysia is nearing US$800 million. What is the primary driver of these figures, and how does Xsolla plan to best tap into its vast potential?

The growing video game market is fueled by the increasing number of worldwide gamers due to the proliferation of mobile gaming, the growth of online gaming communities, and the accessibility to gaming platforms. In addition, the rapid innovations of virtual reality and cloud gaming technologies highly contribute to the expansion of the gaming industry.

At Xsolla, partnering with local game developers and publishers can help tap into the huge potential of Malaysia's gaming industry. Companies can use the market to tailor the games to fit the local's preferences by offering specific payment systems, localised customer service, and culturally relevant gaming materials.

A mobile-first strategy is essential in light of the rise of smartphones and the rising popularity of mobile gaming in Malaysia and other developing nations. This approach will allow more space for developments in terms of game optimisation, mobile

payment alternatives, and mobile user-centric marketing. To realise the industry's full potential, Xsolla aims to engage in conversations with the Malaysian gaming community by organising and participating in in-person gatherings and online gaming communities as they reflect the local market's wants and demands. Through this, we can benefit from data-driven decision-making by evaluating data and analytics to get insight into market trends and player behaviour, which will be incorporated to hone advertising approaches, enhance the game design, and boost monetisation efforts.

How have the Malaysian government and MDEC facilitated your journey in developing the new office in KL?

The Malaysian government and MDEC greatly aided our move to open an office in KL; their help has been crucial as we grow. The government's pro-business laws,

I AM EXCITED TO ANNOUNCE THE OPENING OF OUR LARGEST GLOBAL OFFICE IN KUALA LUMPUR, A STRATEGIC MOVE THAT WILL ENABLE US TO TAP INTO THE THRIVING US$200 BILLION VIDEO GAME MARKET. OUR PRESENCE IN KL STRENGTHENS OUR COMMITMENT TO SUPPORTING LOCAL TALENT, FOSTERING COLLABORATION, AND DELIVERING UNPARALLELED GAMING EXPERIENCES TO MALAYSIA'S RAPIDLY GROWING GAMING COMMUNITY AND BEYOND."

CHRIS HEWISH,
PRESIDENT OF XSOLLA

digital and creative industry incentives, and efforts to encourage the gaming industry, including lowering taxes and streamlining regulations, have pulled Xsolla to invest and grow in Malaysia.

MDEC, through its many programmes and projects, has been instrumental in helping us connect with local game designers, publishers, other industry players, and qualified candidates. In addition, the guidance from MDEC helped us comprehend regulatory requirements, acquire relevant licenses, and seamlessly enter the Malaysian business landscape. Ultimately, we aim to maintain a productive working relationship with the government and MDEC to benefit the Malaysian gaming sector.

The KL office is Xsolla's largest global office outside of Los Angeles. What are the areas you specialise in? Are there also specific markets that the KL office will cater to?

The KL office will be essential for our organisation's future success. Xsolla will focus on several crucial aspects, such as localised products and services, to meet the specific needs of the local and regional gaming communities, which is one of our areas of expertise. Also, we aim to foster the development of local and regional game creators and publishers by providing them with co-creation possibilities, marketing aid, and technical support through our collaborations.

Serving the Malaysian market, the KL office will act as our regional centre, allowing us to cater to other expanding markets in Southeast Asia better. Through this, we can better understand and serve gamers and game developers in the wider SEA region. This office will increase our footprint in the fast-growing Asian market and help us fulfil our aim of empowering developers and publishers to succeed in the global gaming industry.

ESG is on everyone's mind now. How do you incorporate the ESG agenda into the KL operations?

At our company, we understand the significance of Environmental, Social, and Governance (ESG) considerations in our business practices. That's why we have crafted a holistic strategy concerning the ESG agenda through our KL operations. Our goal is to reduce our environmental impact significantly. We will achieve this by adopting energy-efficient practices and promoting a sustainable office culture.

Do you leverage emerging technologies, in your new KL office? If yes, please elaborate on how these technologies enhance your operations.

One of the things I love about the games industry is how it never stands still. New technologies such as AI and blockchain are constantly emerging and providing new opportunities. We're already using AI to help increase productivity with some of our internal operations, and we're looking at how we can create partner-facing solutions that can leverage AI to help partners be more successful.

STANDOUT FACTORS ABOUT MALAYSIA FOR XSOLLA

- Rapidly growing gaming market with increasing consumer spending and a rising number of developers and publishers > Opportunity to offer Xsolla's services to a larger customer base.
- A tech-savvy population with high internet penetration and smartphone adoption > Makes it an attractive market for Xsolla's payment and billing solutions.
- Strategically located in Southeast Asia > Able to serve clients across the region better.
- Competitive cost of doing business > Able to maintain cost-effective operations while providing high-quality services to clients.
- Offers various initiatives and incentives for foreign investment and the gaming industry > Favourable environment for Xsolla's expansion.
- Equipped with a skilled workforce with a strong technology background and English proficiency > Easier for Xsolla to recruit qualified professionals and collaborate with local partners.

Xsolla believes its expansion into Kuala Lumpur's strong gaming market will further strengthen partnerships with local developers and companies.

Last year we released our NFT Checkout feature allowing game makers to seamlessly conduct the business of buying, selling and even minting NFTs. So we're interested in how blockchain can further benefit our partners. We are committed to staying at the forefront of innovation in the gaming industry and evolving with it to give our partners the best experience possible.

XSOLLA'S ESG AGENDA

- Utilises energy-efficient equipment
- Minimises paper usage, encourages recycling and waste reduction
- Fosters a diverse, inclusive, and supportive work environment
- Prioritises employee well-being
- Offers fair and competitive remuneration
- Promotes diversity and equality in the hiring process
- Provides opportunities for professional development
- Engages actively with local communities
- Establishes transparent internal policies and procedures
- Maintains open communication channels
- Adheres to the highest ethical standards in business dealings

What are your plans for Xsolla?

We are committed to providing solutions that help our partners and industry colleagues succeed. To achieve this, we are constantly expanding our partners' revenue-generating capabilities by offering a diverse range of payment options available worldwide, including cryptocurrencies. We are also exploring ways to broaden our partners' reach by enabling access to new platforms and markets through super apps and telecommunication networks. At the same time, we are looking at ways for our partners to build stronger player relationships with direct offerings and communications. Our team in KL is spearheading the development of many of these new solutions.

Xsolla supports video game developers with funding, launching, marketing, generating revenue, and selling their products. By targeting players who opt to pay locally for their gaming experiences using their preferred payment method, its cutting-edge tools and services can help developers grow their gaming businesses more rapidly. Xsolla aims to provide payment services to the global video gaming industry and continue its expansion commitment across Asia through its Kuala Lumpur location.

Xsolla's office is fully equipped with cutting-edge technology and amenities, including a spacious conference room, cosy breakout areas for collaboration, and an open-plan layout to foster an inclusive and collaborative work environment.

MDEC PROPELLING SUSTAINABLE ADVANCES IN DIGITAL ECONOMY

MDCAP, a corporate pledge aimed at boosting sustainability in the digital ecosystem, has been thoroughly developed by MDEC in partnership with UNGCMYB

MALAYSIA has been on a steady march towards becoming a major player in the digital economy sector, with the government actively promoting and incentivising the development of digital infrastructure and ecosystems. As a result, the country has attracted the attention of global companies and investors, and its digital economy has witnessed rapid growth in recent years.

With this growth, there has been a growing awareness of the need for responsible and sustainable business practices and a focus on Environmental, Social, and Governance (ESG) factors. The Malaysia Digital Climate Action Pledge (MDCAP) is a testament to this commitment towards addressing the impact of climate change.

ABOUT MDCAP

The Malaysia Digital Climate Action Pledge (MDCAP) is an initiative by MDEC to accelerate the number of commitments made by businesses across the digital economy and deliver a measurable reduction in the impact of climate change.

> **THERE ARE NOT MANY SECOND CHANCES IN LIFE, AND TAKING CARE OF THIS BIG BLUE PLANET THAT WE CALL HOME CONSTITUTES ONE OF THEM."**

TS. MAHADHIR AZIZ,
CEO OF MDEC

CLIMATE CHANGE: WHAT DIGITAL ECONOMY CORPORATIONS NEED TO KNOW

- A global consensus on climate change is a critical problem requiring urgent action by governments and businesses.
- Digital technology businesses can participate in the rapidly developing Climate adaptation industry, which the World Economic Forum (WEF) estimates will reach USD2 trillion by 2026.
- Malaysia is committed to becoming carbon neutral by 2050, and Malaysian businesses will play a key role in achieving this target.
- ESG, including climate impact, is now a key criterion for equity and debt financing in Malaysia and worldwide.
- Globally, 78% of MNCs will remove suppliers that endanger their carbon transition plan by 2025.

The corporate pledge, MDCAP, is developed to ensure businesses adopt sustainable practices in daily activities and give better exposure to climate change. The initiative was made possible by MDEC's efforts in collaboration with the UN Global Compact Network Malaysia & Brunei (UNGCMYB). The pledge is well-aligned with the government's vision of being a carbon-neutral nation by 2050. According to the 12th Malaysia Plan (12MP), the government aims to reduce GHG emissions intensity of GDP by 45% by 2030, compared to a 2005 baseline, and to attain a 31% renewable energy mix by 2025.

As some corporations may find it challenging to reassign their business operations towards more sustainable ways, being a part of the MDCAP pledge will bring wider access to a range of resources and best practices to aid their transformation. The signatories will have access to materials such as a climate action playbook and a carbon toolbox (which includes a calculator, online scoresheet, and reporting tool) to help them develop an affirmative climate action strategy. The information and best practices supplied are intended to be as applicable to all stages of sustainability implementation development as possible.

By signing the MDCAP pledge, businesses will be able to chart the next course of their next climate action through various means. This includes:

- Digital solutions - Encourage digital technology adoption to mitigate businesses' carbon footprints
- GHG emissions - Help digital and tech industry players to transition towards carbon-neutral business
- Supply chain - Influence businesses to implement responsible sourcing across their supply chains
- Advocacy - Raise awareness of the urgency of managing climate change across all segments of tech society

WHY MDCAP

Gets free access to Climate Action Guidebook for the Digital Economy in partnership with UNGCMYB.

Seventy-five eligible SME signatories will enjoy a 100% rebate (commercial value at RM400) of Taylor's University E-learning.

Gets access to exclusive webinars and sustainability training sessions in partnership with UNGGMYB.

Receives MDCAP Pledge Certificate and recognition on social and other media.

Better equipped to comply with increasing regulations, both in Malaysia and internationally.

Improved competitive advantage and reputation.

Appears more attractive to investors, customers, and employees.

Sustainable business practices will ensure long-term economic development without negatively harming the community's social, environmental, and cultural aspects.

MDEC'S ESG ROADMAP

MDEC has positioned its ESG journey, which started in 2022, through engagements with internal and external stakeholders. MDEC set out its first step via the ESG Policy to give context for implementing ESG principles and practices, strengthening MDEC's sustainability credentials and enhancing its overall value proposition. This enables MDEC to lead by example and drive adoption across the ecosystem. Next, MDEC will unveil the ESG Roadmap, which will structure its strategies and focus areas in creating a more sustainable digital economy via integrating ESG practices within MDEC and its ecosystem. This will be supported by the strength of the divisional ESG Champions, which will carry out targeted ESG adoption and engagement activities.

Together, let's fight climate change by building an environmentally friendly digital economy. Make your mark on sustainability today!

JOIN THE PLEDGE

METAVERSE SHOWS RESILIENCE DESPITE SETBACKS FROM MAJOR TECH COMPANIES

Written by **Digital Content Development Department, MDEC**

Metaverse merges physical and virtual realities to offer immersive experiences and global collaboration, holding significant potential despite recent setbacks for some tech giants

THE metaverse, an increasingly popular virtual environment, has recently faced setbacks as notable tech companies have downsized their metaverse divisions, leading many to question the viability and future of such virtual realms. However, it is important to acknowledge that the metaverse continues to hold relevance and promise, even amidst these obstacles. This frontier in human interaction, commerce, and entertainment has great potential for success and growth.

With the immense potential to revolutionise various aspects of our lives, the metaverse seamlessly integrates physical and virtual realities, enabling individuals to engage in immersive experiences, connect with others globally, and explore endless possibilities. Furthermore, the ability to transcend geographical limitations and constraints paves the way for new forms of communication, collaboration, and entertainment. Despite a few tech giants' setbacks, this immense potential remains prominent.

For instance, gaming companies like Epic Games have already demonstrated the popularity and revenue-generating capabilities of virtual worlds with Fortnite and Roblox. The education sector is also exploring the metaverse for immersive learning experiences. Platforms like Engage and AltspaceVR offer virtual classrooms where students can interact with each other and engage in collaborative learning activities.

While some major tech companies may have experienced setbacks in their metaverse endeavours, it is crucial to remember that the metaverse concept extends far beyond the efforts of a few players. Decentraland, Cryptovoxels, and Somnium Space are companies that build virtual worlds with unique features to attract more users and creators onto their platforms. The metaverse represents a vast and diverse ecosystem of numerous innovative startups, developers, and creators.

These individuals and organisations continue to explore and contribute to the metaverse's growth, ensuring its resilience and eventual success. The metaverse is not solely dependent on the actions of a few tech giants; it thrives on the collective efforts of an entire industry. One example is Mattle, the primary brand recently steered into Web3 with Fast & Furious NFTs[i]

Despite recent setbacks, investors' interest in the metaverse remains strong. The metaverse is seen as the next frontier in technology and presents lucrative opportunities for growth and profitability. Venture capitalists and private equity firms recognise the transformative potential of the metaverse and are actively investing in startups and companies dedicated to its development.

This sustained investment ensures the metaverse will continue to evolve and mature, regardless of the challenges tech companies face. In recent funding rounds for metaverse-related companies, GEM in Everdome metaverse cost $60 million, while the Henan government invested $22 million. KPMG also recently reported 90% of investors remain optimistic about the metaverse development. The investors

> The metaverse, a diverse ecosystem comprising several innovative startups, developers, and creators, continues to progress and evolve through its stakeholders' continuous exploration and contribution, ensuring its resilience and ultimate success.

predicted the metaverse would be the next phase of the internet and envision a future where the metaverse would be utilised for work meetings, training, and learning experiences.[ii]

The widespread adoption of virtual reality (VR) and augmented reality (AR) technologies has laid the foundation for the metaverse's success. Users are increasingly embracing immersive experiences and seeking more interactive and engaging digital content. The metaverse offers a space where users can explore, socialise, and consume content in novel ways.

CoinTelegraph reported that news of Apple's new mixed-reality headset scheduled for release had caused a surge in metaverse tokens.[iii] Meanwhile, ten Japanese firms joined forces in Japan to create the metaverse economic zone on top of its government investment into metaverse and NFT expansion last October.[iv]

Collaboration and standardisation across the industry are essential to realise the metaverse's full potential. Industry players, including tech companies, developers, and authorities, must recognise the need to cooperate in building an inclusive and

i   https://nftplazas.com/mattel-fast-furious-nfts/
ii https://venturebeat.com/games/investors-remain-bullish-on-the-metaverse-kpmg/
iii https://cointelegraph.com/news/apple-headset-could-boost-metaverse-token
iv https://cryptoslate.com/japan-follows-up-on-metaverse-investment-plans/

> The metaverse is fast expanding beyond gaming and virtual reality, offering prospects for practical business applications that benefit more corporate businesses investing in this realm.

interoperable metaverse. While efforts are underway to establish common protocols, open standards, and frameworks that enable seamless integration and ensure a vibrant and interconnected metaverse, the industry can only overcome setbacks by creating a thriving metaverse ecosystem.

While setbacks faced by major tech companies may temporarily overshadow the metaverse's progress, the long-term potential and relevance of this virtual realm remain indisputable. The metaverse is more than the endeavours of a few companies; it represents a collaborative effort involving numerous stakeholders. The diverse ecosystem, sustained investor interest, growing user demand, and joint initiatives all point towards the metaverse's eventual success. As technology evolves and innovation flourishes, the metaverse will become integral to our future, transforming how we connect, communicate, and experience the digital world.

The Malaysia Digital Economy Corporation (MDEC), as the one-stop agency driving Malaysia's digital economy, is championing metaverse initiatives for Malaysians. One of its latest efforts is the establishment of the IP360 Metaverse Industry Expert Council (MIEC), a group of selected industry experts in the game, animation, NFT, blockchain/DAO, metaverse, Web2/Web3, creative technologies (AR/VR/MR/XR), legal, venture capital, and other areas related to metaverse initiatives. This is on top of other initiatives, including opening up a creative tech category for the metaverse under the Digital Content Grant 2023.

Microsoft

STRENGTHENING THE BOND BETWEEN MICROSOFT AND MALAYSIA

Malaysia is one of the most nurturing countries in Southeast Asia as it is a land of progressive possibilities

FOR decades, Microsoft has recognised the immense promise in Malaysia with its economic and technological growth and aims to bring innovation to new heights.

In this interview, K Raman, the Managing Director of Microsoft Malaysia, unveils the company's journey in expanding its footprint in the country and the plan to bolster partnerships on our shores.

What drew Microsoft to Malaysia?
Microsoft set foot in Malaysia more than 30 years ago, in July 1992. Malaysia is a rapidly developing country with a promising economic and technological growth outlook. In 2021 alone, the information and communication technology (ICT) industry contributed 23.2% to the nation's GDP, amounting to RM359.3 billion, representing a 12.1% growth from 2020.[i]

The government's push for digitalisation is clear – particularly with the Malaysia Digital Economy

Blueprint, which looks into growing the local economy through digital technology, including building a digital government, fit-for-purpose digital talents, a digitally inclusive society, and a safe and secure digital environment. Furthermore, the government's visionary approach extends beyond economic growth, as introduced in the Malaysia Madani framework, which champions inclusive and sustainable development.

Geographically, Malaysia is situated in a strategic location between the Indian Ocean and the South China Sea, making it well-serviced by primary air and shipping lines. Malaysia has a highly diversified economy and export structure, and a supportive labour market – the overall secure economic foundation was what drew us here too.

i Department of Statistics Malaysia (Information and Communication Technology Satellite Account 2021)

On top of that, Malaysia has already signed and implemented various free trade agreements (FTA).

This translates to lower trade barriers and costs of doing business and grants organisations operating here access to capture growth opportunities.
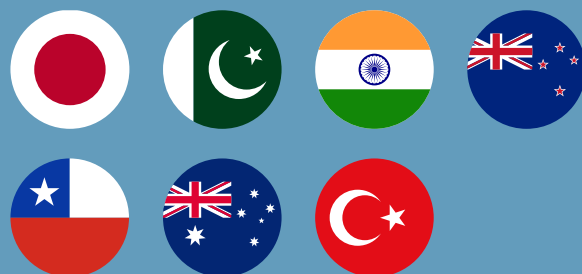
MALAYSIA'S BILATERAL FTAs

- Japan
- Pakistan
- India
- New Zealand
- Chile
- Australia
- Turkey

Source: Ministry of Investment, Trade and Industry

REGIONAL FTAs AT ASEAN LEVEL (AFTA)

- China
- Korea
- Japan
- Australia
- New Zealand
- India
- Regional Comprehensive Economic Partnership (RCEP)
- The Comprehensive and Progressive Agreement for Trans-Pacific Partnership (CPTPP)

Source: Ministry of Investment, Trade and Industry

With its diverse culture, Malaysians are multilingual and multiracial, presenting more perspectives and opportunities for an inclusive and innovative workforce. To realise this, expanding our presence was a crucial step forward. Still, beyond that, we want more people to discover and enjoy the

K RAMAN,
MANAGING DIRECTOR
OF MICROSOFT MALAYSIA

benefits of technology together – and we believe this can be brought to life in Malaysia.

How have the Malaysian government and key Malaysian Government agencies such as MDEC facilitated Microsoft's journey in Malaysia?
The government has consistently taken action as part of its push to improve Malaysia's value proposition in the digital economy. The government, through its various agencies has also been supportive in enabling the private sector, including Microsoft, to partner together and build Malaysia's digital ecosystem – both from a tech infrastructure, adoption of tech tools, and producing the digital capabilities of Malaysians to be ready for the digital economy.
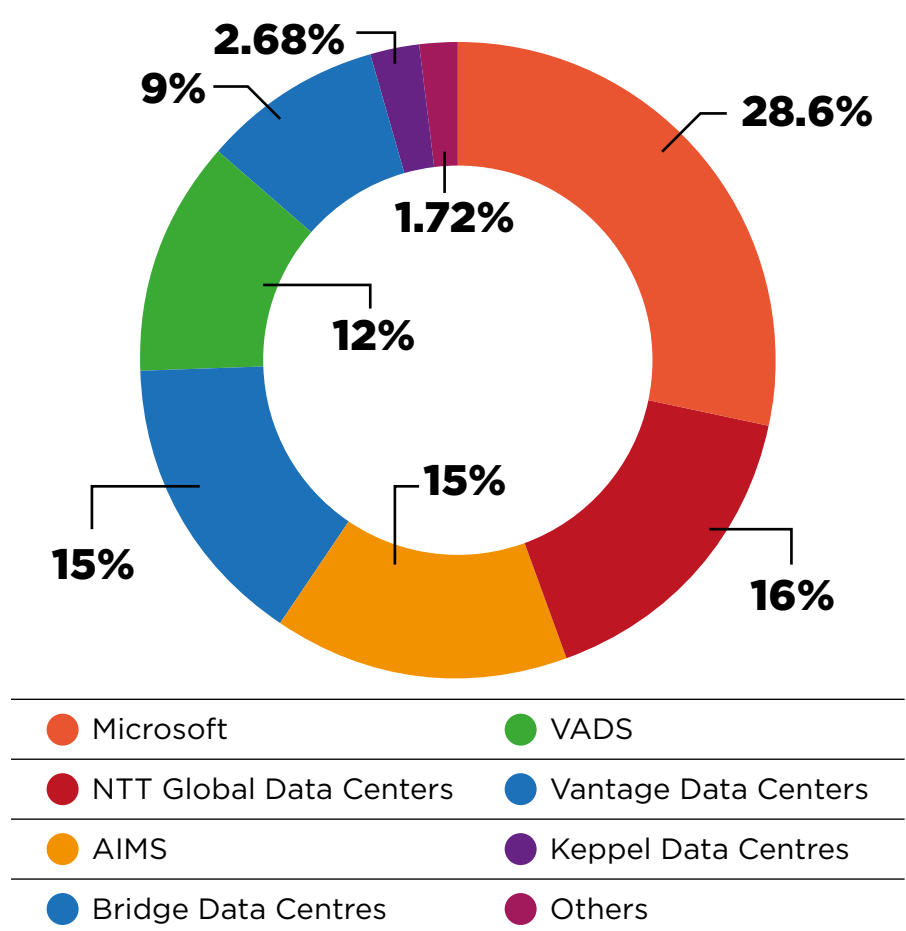
Our relationship with MDEC started a while back. We have just collaborated with MDEC for the 'Highway to 100 Unicorns', and more recently, we also collaborated on an upskilling programme via Let's Learn Digital. Our work together with key Malaysian Government agencies such as MDEC is not only aligned with our commitment to facilitate the transition to the cloud, but more importantly, collaborations play a crucial role in expanding our commitment and ensuring that once our data centre region is available, more people and organisations can leverage cloud services in the nation's growing digital future.

How has Malaysia's data centre industry evolved over the years Microsoft has been here? What are some of the areas in Malaysia's data centre ecosystem that have room for improvement?
According to Arizton's latest research report, the local data centre industry is expected to grow at a CAGR of around 7% during 2022-2027, with over US$2 billion to be invested. In addition, tax benefits by the government have encouraged investments by the hyper-scale and co-location operators. Such initiatives have enabled the development of data centres in free trade zones. On a regional scale, Southeast Asia is witnessing data centre investments across multiple cities. An analysis by MIDA showed that Malaysia is a key market due to the sheer scale of the opportunity.

Local data centre infrastructure supports and stimulates economic development for both customers and partners alike,

MARKET SHARE IN KL

Legend:
- Microsoft
- NTT Global Data Centers
- AIMS
- Bridge Data Centres
- VADS
- Vantage Data Centers
- Keppel Data Centres
- Others

* Self Build and Colocation - Live, under construction and committed capacity

Source: Knight Frank Data Centre Research Report MALAYSIA, April 2023

enabling companies, governments, and industries to realise the benefits of the cloud for innovation and new projects, as well as bolstering the technology ecosystem that supports these projects.

We are still in the early stages of our nation's journey with the cloud, but progress is certainly being made. To accelerate this transformation, a key action for the government is to evolve the regulatory and policy environment from one that permits cloud to one that actively encourages cloud adoption where appropriate.

MALAYSIA TOPS THE KNIGHT FRANK SEA-5 DATA CENTRE OPPORTUNITY INDEX

Rank	Market	Take Up (MW)	GDP growth (%)
1	Malaysia	113	8.7%
2	Indonesia	22	5.3%
3	Vietnam	2	8%
4	Philippines	2	7.6%
5	Thailand	25	2.6%

Source: Knight Frank Data Centre Research Report MALAYSIA, April 2023

One of the ways to accelerate adoption would be for the government to lead by example and spearhead a cloud-first approach by moving to the cloud and heightening awareness of its benefits, such as resilience, security, technology capabilities, cost, and energy efficiencies.

In addition, a regulatory regime for data, benchmarked to international best practices would encourage regional workloads to be hosted in Malaysia.

When data centres were first introduced, it was one approach to provide an alternative space for organisations to store data. However, data centres of hyperscale cloud service providers now offer capabilities that are much beyond mere storage. Today, they are larger, equipped with better security capabilities, and offer enhanced regulatory compliance.

What are Microsoft's future plans with its data centres in Malaysia?
Once available, the data centre region in Malaysia will provide highly available, scalable, and secure cloud services across

Malaysia with the option of customer data residency and reduced latency in the country.

Globally, we are also accelerating progress toward a more sustainable future by reducing our environmental footprint, accelerating research, helping our customers build sustainable solutions and advocating for policies that benefit the environment.

We have a long-term vision that we refer to as our own 100/100/0 commitment. Like other users, our data centres and our offices around the world simply plug into the local grid, consuming energy from a vast pool of electrons generated from near and far, from a wide variety of sources. So, while we can't control how our energy is made, we can influence the way that we purchase our energy. By 2030, Microsoft will have 100% of our electricity consumption, 100% of the time, matched by zero-carbon energy purchases.

> When data centres were first introduced, it was one approach to provide an alternative space for organisations to store data. However, data centres have evolved as technology advances, and market demand grows.

UNCOVER THE FUTURE OF THE SKIES WITH THE POSSIBILITIES OF AUTONOMOUS DRONES

Asia Pacific University of Technology & Innovation as a member of MDEC's Premier Digital Tech Institution aims at bridging the gap between academic theoretical knowledge and hands-on practical application to ensure graduates meet industrial needs

THE advent of the 4th industrial revolution (IR4.0) has been hailed as the pivotal point in human history as we begin taking pivotal steps towards digitising our living world through the Internet of Things (IoT). Due to this, unmanned aerial vehicles, more ubiquitously known as drones, have transcended their roles from serving as instruments of IoT proliferation to the nascent enablers of the human-machine interface (HMI) often lauded as the cornerstones of the 5th industrial revolution (IR5.0).

Aerial drones have liberalised the airspace and have transformed a niche hobbyist device into a mainstream autonomous robot, well-suited for various applications from search and rescue to last-mile delivery of goods. Furthermore, the advent of autonomous aerial drones has accelerated the progress of the digital ecosystem meant to expand its field of applications.

Therefore, we are experiencing rapid growth in artificial intelligence (AI), data analytics and the digital space in general. In the Malaysian context, the Malaysian Digital Economy Corporation (MDEC) has been at the forefront of pushing the IR4.0 agenda on our local shores through the Malaysia Digital (MD) initiative, a strategic blueprint meant to guide us into this new unguided territory.

The sky, once a taboo zone, strictly controlled and rendered inaccessible by the high entry cost of aerial vehicles, has been revolutionised. Furthermore, these autonomous robots have leveraged their mobility, aerial vantage point and the assortment of sensors to redefine the accepted norm. The MDEC-driven Premier Digital Tech Institutions (PDTIs) initiative plays a vital role in infusing these technologies into the curriculum of our tertiary institutions to equip our graduates, the future digital tech-based workforce, with the high-value digital skillsets required to capitalise and harness these technologies to create customised solutions for a plethora of use cases.

The unfettered access to the Malaysian skies (subject to local aviation regulations) has transformed the landscape, leveraging digital technology to provide end-to-end solutions for various industries. Appointed as a Premier Digital Tech Institution (PDTI) by MDEC, Asia Pacific University of Technology & Innovation (APU) - Centre of Research of IoT, has worked with local growers on precision agriculture to implement plant analytics and relegate autonomous tasks previously heavily reliant on the workforce

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THE SKY, ONCE A TABOO ZONE, STRICTLY CONTROLLED AND RENDERED INACCESSIBLE BY THE HIGH ENTRY COST OF AERIAL VEHICLES, HAS BEEN REVOLUTIONISED. AUTONOMOUS ROBOTS HAVE LEVERAGED THEIR MOBILITY AND THE ASSORTMENT OF SENSORS TO REDEFINE THE ACCEPTED NORM."

IR. NARENDRAN RAMASENDERAN,
SENIOR LECTURER AT APU

to the aerial drone. Plant analytics, which incorporates a bevvy of IoT sensors to monitor and control various plant growth parameters, also is embedded with deep learning models to optimise fertilisation and irrigation.

PDTIs aim to raise the quality of digital tech graduates to become a pool of industry-ready talents equipped with modern digital tech education.

These tasks can be performed autonomously by drones and monitored from anywhere in the world. Moreover, in bigger farms, customised thermal sensors can be equipped to scan entire swaths of land and determine their moisture content and parameters to create precise deep-learning models to automate the process.

Appointed as a Premier Digital Tech Institution (PDTI) by MDEC, Asia Pacific University of Technology & Innovation (APU) - Centre of Research of IoT, has worked with local growers on precision agriculture to implement plant analytics and relegate autonomous tasks previously heavily reliant on the workforce to the aerial drone.

Search and rescue operations standard practices have been completely overhauled with aerial drones. Their unique capability to commute in the sky facilitates these operations and saves lives. For example, an aerial drone coupled with a thermal camera and light detection and ranging sensor (LiDAR) can glean through smoke and identify victims through thick plumes of smoke or those buried under deep soil in an earthquake. All this pertinent information would allow search and rescue personnel to make better decisions in their operations. Additionally, AI models can teach drones to aid victims or control and extinguish fires autonomously.

At the forefront of these aerial drones is the software that enables them to compute and analyse data. This leverages various elements of AI, such as deep learning, computer vision, and machine learning, among others. PDTIs are crucial to imbibe these skills into their graduates whilst at the campus, ensuring they can build customised AI models depending on their application.

Additionally, in the School of Engineering at APU, as a PDTI, there is an absolute need to bridge the gap between academic theoretical knowledge and hands-on solutions-driven application. Therefore, collaboration with various industries to build solution-specific applications using artificial intelligence is the aim to ensure our graduates meet industrial needs. The institution has worked with multiple companies on leveraging aerial drones with photogrammetry or LiDAR mapping to create digital twins of facilities and populate them with real-time IoT sensors for active modelling and optimisation. They have also worked closely with the industry to develop customised deep or machine learning models trained through edge or cloud computing solutions.

As a brainchild between MDEC, the Ministry of Education (MoE) Malaysia and industry leaders, the PDTIs deliver life-changing solutions to ensure that future graduates are propelled into becoming dynamic members of an innovation-driven and knowledge-powered Malaysian.

Ir. Narendran Ramasenderan is an experienced mechatronics professional engineer with a diverse portfolio of projects from renewable energy to autonomous unmanned vehicles. Narendran is working on enabling the industrial metaverse using autonomous robots towards a sustainable future.

IN CASE YOU MISSED IT

▮ Business and tech news round-ups

Bye Singapore, Hello Malaysia: Expats Chase Cheaper Living Costs

The lower living costs in cities such as Kuala Lumpur and Ho Chi Minh are attracting some expats away from Singapore. Nic Chambers, Managing Director of Michael Page Malaysia, stated that there has been a 'strong appetite' to relocate staff from Singapore to neighbouring Malaysia due to its location, English-speaking population, lower cost of living and strong presence of back-end office functions.

U.S. Businesses Lead Exodus Out of Hong Kong

According to the Fractured foundations: Assessing risks to Hong Kong's business environment research paper, Hong Kong faces a series of serious challenges to its role as a leading Asian financial centre, including threats to the status of the Hong Kong dollar, an erosion of its prized rule of law, and a crackdown on dissent and free speech.

When ASEAN Is Prosperous, the World Is Better Off': US Envoy on Building Closer Ties with the Regional Bloc

The United States Ambassador to ASEAN, Yohannes Abraham, has stated that the US wants to deepen its relations with ASEAN, which is 'absolutely critical' to its push for greater Indo-Pacific presence. Meanwhile, US President Joe Biden had said ASEAN is 'the heart' of his administration's Indo-Pacific strategy. Mr Abraham added that ASEAN has a vital role in regional architecture, and when the region is better off, the world is better off.

CNA Explains: Why Did the Singapore Dollar Hit an All-Time High against the Malaysian Ringgit?

On May 24, the Singapore Dollar broke its record against the Malaysian Ringgit as it touched 3.4102, according to Bloomberg data. Malaysia's central bank Bank Negara Malaysia said the recent weakness in the Ringgit could be attributed to external developments such as the US debt ceiling impasse and 'episodes of stress' in the US and European banking sectors. CNA spoke to analysts on the factors behind the Ringgit's depreciation against the Singapore Dollar and what might lie ahead for the value of both currencies.

Amid Great Power Tussle, ASEAN Has Big Opportunities: Ex-Indonesian Minister

Former Indonesian minister Mari Pangestu believes that ASEAN needs to reinforce open regionalism and develop a long-term low-carbon vision to take advantage of opportunities or risk member states drifting apart. With open regionalism, ASEAN will engage all countries who accept its rules without discrimination against any other - unlike the exclusive trade and investment club under close regionalism.

EVENTS HIGHLIGHT

Glimpses of what matters: Coverage of MDEC's engagements and initiatives

2023

13 APRIL

AN IMPACTFUL MEETING WITH SEDIA
MDEC had the pleasure of meeting with Ynez Teo, Principal Senior Executive at the Sabah Economic Development and Investment Authority (SEDIA), to discuss SEDIA's investment promotion activities and explore potential areas of collaboration. The conversation centred around digital investment promotion activities, focus and potential areas of collaboration between the two investment promotion agencies.

03 MAY

MELAKA STATE EXCO'S VISIT TO MDEC
CEO of MDEC, Ts. Mahadhir Aziz had a courtesy visit from the Melaka State Science, Technology, Innovation and Digital Communication EXCO, YB Tuan Fairul Nizam Roslan, at the MDEC Headquarters, Cyberjaya, to strengthen MDEC's cooperation with the Melaka state government. The Deputy EXCO for Science, Technology, Innovation, and Digital Communication, YB Tuan Mohd Noor Helmy Abdul Halem, UPEN Melaka, MCMC Melaka, BTMK, MICTH, and RICE Melaka, were present.

05 MAY

IN DEPTH INTERVIEW WITH FORTUNE MAGAZINE
As a key driver of Malaysia's digital economy, MDEC constantly identifies significant ways to accelerate the country's development and aspires to work with visionaries to achieve growth together. CEO of MDEC, Ts. Mahadhir Aziz shared MDEC's latest initiatives and achievements with Fortune Magazine, including the high-impact catalytic programmes and the opportunities to accelerate digital transformation via the key verticals that have been identified.

11 MAY

GOVINSIDER LIVE ASEAN 2023

Raymond Siva, Senior Vice President, Digital Investment, MDEC, was a panellist at the GovInsider Live ASEAN 2023 held at Le Méridien Putrajaya alongside esteemed key decision-makers from the public sector in Malaysia. The insightful discussion revolved around cloud computing and citizen-centric services being the future of public service.

11-14 MAY

OXFORD INDUSTRY-ACADEMIA DIALOGUE AND INAUGURAL OCIS-UTM SCIENCE ROUNDTABLE

MDEC was invited to the Oxford Industry-Academia Dialogue and also the Oxford Centre for Islamic Studies (OCIS) and Universiti Teknologi Malaysia's (UTM) inaugural OCIS-UTM Science Roundtable on 'Imagining The Future: Climate Change, Public Health and Food Security in Muslim Societies". It was an intellectual discourse on climate change, public health and food security.

The event was graced by HM The Permaisuri of Johor, Raja Zarith Sofiah Binti Almarhum Sultan Idris Shah, UTM's Chancellor, and involved many influential figures.

12 MAY

GBS ASIA AWARDS 2022/2023 NIGHT

It was a night of glitz and glamour as excellence was recognised at the Global Business Services (GBS) Asia Awards 2022/2023, organised by GBS Malaysia, a chapter of the National Tech Association of Malaysia (PIKOM), held at Le Méridien Petaling Jaya. More than 70% of the winners were Malaysia Digital Status companies, further proof of MDEC's commitment to supporting Digital GBS companies.

15-16 MAY

MARKET ACCESS TRIP TO JAKARTA

MDEC wrapped up its market access trip to Jakarta, Indonesia, led by Gopi Ganesalingam, Senior Vice President, Digital Export, MDEC. During the trip, the agency finalised the DEX Connex platform, an exclusive business matching platform for Malaysian Tech companies and suitable foreign partners to foster mutually beneficial relationships and collaborations for market expansion.

16 MAY

STRENGTHENING RELATIONSHIP TIES WITH FELDA

MDEC conducted a productive engagement session with Tan Sri Dato' Seri Haji Idris bin Jusoh, FELDA Chairman at Menara FELDA, Kuala Lumpur. Raymond Siva, Senior Vice President, Digital Investment, MDEC, shared MDEC's initiatives to drive the digital economy forward and collaborate with FELDA and its community.

16 MAY

MAJLIS JALINAN AIDILFITRI 2023 WITH INVEST NS

The MDEC team attended the Majlis Jalinan Aidilfitri 2023 with Invest NS to foster stronger collaboration between the two investment promotion agencies while celebrating the joy and togetherness of the month of Syawal.

18 MAY

KAZAN ECONOMIC FORUM

MDEC had a successful opening at the prestigious Kazan Economic Forum. Leading the Malaysian delegation were YB Datuk Seri Hj Mohamed Khaled Nordin, Minister of Higher Education, and YB Datuk Seri Hj Mohamad Sabu, Minister of Agriculture and Food Security. Also in attendance was Datuk Fadzli Abdul Wahit, Senior Vice President, Digital Industry Development, MDEC.

19 **MAY**

MDEC'S AIDILFITRI OPEN HOUSE

MDEC's Aidilfitri Open House brought smiles, laughter, and cherished moments among the MDECrew and the agency's various partners who came together to celebrate the month of Syawal in a spirit of unity and harmony at the Sime Darby Convention Centre, Kuala Lumpur, where they were treated to exciting performances and mouth-watering delicacies.

23 **MAY**

PAHANG STATE EXCO'S VISIT TO MDEC

Ts. Mahadhir Aziz, CEO of MDEC, received a courtesy visit from YB Datuk Mohamad Nizar Bin Dato' Sri Mohamad Najib, the Pahang State Investment, Industry, Science, Technology and Innovation EXCO to deepen the partnership between the Pahang state government and MDEC in digital investment, talent development, and the improvement of the digital skills of Malaysians.

23-27 MAY

MDEC AT LIMA 2023
MDEC had a memorable experience at the Langkawi International Maritime and Aerospace Exhibition (LIMA) 2023. The MDEC team was privileged to meet industry players from the aviation and maritime sectors in an exciting B2B session. Attendees meanwhile had the opportunity to discover how MDEC is helping revolutionise the aerospace and marine industries with digital transformation at the cybersecurity pavilion.

23 MAY

PRODUCTIVE MEETING WITH INVEST NS, QUILL PROPERTY AND MIDA
MDEC took part in a fruitful meeting with Invest NS, Quill Property and Malaysian Investment Development Authority (MIDA), focusing on attracting tech investments from China into Negeri Sembilan. Incentives provided by MIDA and MDEC were also discussed in detail, aspects crucial to further increase the appeal of Negeri Sembilan as a digital investment destination.

TAKE IT EASY

Light takes on technology that makes the world go round

Q: Why did the PowerPoint Presentation cross the road?
A: To get to the other slide.

PRESENTATION

If, at first, you don't succeed, call it version 1.0.

Why was the IT guy always calm?
He had everything under CTRL.

To find out more about MDEC's Digital Economy initiatives, please visit us at www.mdec.my or follow us on:
Facebook: www.facebook.com/MyMDEC/
Twitter: @mymdec
If you wish to contribute to Digital Pulse, please drop a mail to clic@mdec.com.my