

A nighttime photograph of a busy city street in Malaysia. The scene is illuminated by streetlights and the vibrant, colorful light trails of moving vehicles, primarily in shades of red and white. Tall buildings line the street, some with glowing windows and others with large, illuminated billboards. One prominent billboard on the left features the text 'APEC 2020 MALAYSIA'. Another billboard below it says 'SPORT FOR CHOICE AND HEAD OVER HEELS.' and 'NOW SHOWING ON...'. A 'GIORDANO' store sign is visible on the left. In the background, a building with 'EQ' signage is lit up. The overall atmosphere is one of a bustling, modern urban environment.

**ICMR**

**Institute for  
Capital Market  
Research**  
Malaysia

Malaysia's Capital Market:  
**Talent as the Driving Force  
for the Post-Pandemic Future**

Malaysia's Capital Market:  
**Talent as the Driving Force  
for the Post-Pandemic  
Future**

2021

*This ICMR report is produced to encourage the exchange of ideas and knowledge-sharing on the issues highlighted in the report, and to facilitate interaction among market participants, policy makers and academics. The views expressed are ICMR's own and not of any of the institutions which ICMR is affiliated to.*

*This paper was prepared by Azleen Osman Rani, Aida Jaslina Jalaludin and Sarah Asha'ari of ICMR. The authors would like to thank the Securities Industry Development Corporation (SIDC) for their contributions to the development of this report. The authors would like to acknowledge the contribution of the Board of Directors of ICMR in providing input and valuable comments. All views and errors remain the authors' own.*

*ICMR welcomes and encourages any questions or suggestions. Please address your comments to Sarah Asha'ari at [icmrall@icmr.my](mailto:icmrall@icmr.my).*

September 2021

# Contents

---

Introduction	5
Chapter One <b>Overview</b>	9
Chapter Two <b>The Global Perspective</b>	13
Chapter Three <b>State of Play of Malaysia's Capital Market Players</b>	26
Chapter Four <b>Industry Survey: Key Findings</b>	37
Chapter Five <b>Strategic Objectives and Recommendations</b>	49
Moving forward	62
References	63

---

# Introduction



## About the report and its objectives

The Covid-19 crisis marked an unprecedented event in the history of economic and financial crises. While financial market regulators and policymakers were able to react quickly to the emerging signs of stress in market disruptions and manage financial stability risks and investor protection during the crisis, the highly disruptive effects of the pandemic will likely lead to several enduring shifts which will shape the “new norm” for our economy and society.

This presents an opportunity for the capital market sector to redefine its role for the future. However, there is much that needs to be done to narrow the structural gaps in transitioning to a more “market-based” financing system, while mitigating the negative impact of Covid-19. Some of the structural weaknesses that were magnified by the pandemic include the need to narrow structural inequalities of wealth and improve financial inclusion, further enhance access to financing for the small-medium

enterprises hit by the pandemic and to restore investor and business confidence on the longer-term prospects of the economy and businesses.

Moreover, structural forces already under way before the pandemic such as technological advancements under IR4.0 and the achievement of the Sustainable Development Goals (SDGs) targets by 2030 as well as other factors such as shifting regulatory imperatives, changing demographics and the evolving nature of globalisation will continue to reshape capital markets in the future, all of which demand greater innovative capacity from the sector. To harness this greater innovative capacity, it is important to understand the state of the fundamental resources needed to facilitate the sectors’ growth- key of which would be the quality of its talent workforce- especially in the context of the massive changes in the structure of work and the technology that shapes it because of Covid-19.

Among the key prerequisites for developing the capital market sector to be more future-ready, investment in digital innovations and talent development strategies coupled with a facilitative regulatory framework are identified as critical enablers. Given the fast evolution of technology applications in the sector, there has been an increased focus of policy development on the more tangible factors of production such as facilitating digital innovations in the sector. While critical for the development of the sector, digital technology by itself cannot create sufficient competitive advantage if the development of the sector is constrained by a more intangible form of “intrinsic capital” i.e. the human capital assets or talent within the industry, which is as, if not more critical to unlocking new growth opportunities and ensuring long-term sustainability of the overall sector.

Studies<sup>1</sup> have shown that human capital, through education, innovation, and constant improvement,

1 Pelinescu, E. (2015). *The Impact of Human Capital on Economic Growth*, Procedia Economics and Finance, 22, 184-190.

contributes significantly to economic growth and development. This relates to the “endogenous growth theory”, which argues that economic growth is directly tied to more investments in human capital, in particular to the number of people in the knowledge sector. More importantly, given the fast-changing world of work, it is not merely enough to fill the quantity of vacancies within the sector. Instead, new efforts need to be bolstered to prepare for the future with the right quality of talent (think of this as efforts devoted to R&D, innovation and the development of new ideas) for the sector to fully contribute to the nation’s economic growth. In sum, it is the “quality” not quantity of talent which should be prioritised for the sector to be able to contribute to the economy and society in the long term. For the capital market sector, having in place a sufficient pool of skilled quality talent to drive and support the long-term growth and development strategies of financial intermediaries to meet the sector’s growth requirements is paramount.

However, human capital attraction and retention challenges in Malaysia’s capital market sector has been an underlying impediment which has intensified over the years. This is due to the combined effects of demographic, social, economic, and market-specific factors which have left significant talent gaps in the industry. It is further exacerbated by the longer-term issue of “brain drain” or the departure of high performing talent from the domestic industry to other markets, more specifically to our neighbouring country, Singapore which is well-positioned as a global financial hub. In addition, the demand and competition for highly skilled financial professionals will only become more acute in the post-pandemic landscape.

This can pose a risk in the form of “human capital risk” to the quality of the services provided by the domestic capital market sector which demands very high competency levels as the market operates in a globally connected, highly dynamic and constantly changing environment. Moreover, as financial products are becoming increasingly complex and investors becoming more sophisticated, the dearth in the supply of talent will remain a critical issue for

the overall development of the domestic industry especially in the context of Covid-19 reshaping business models and talent needs.

This research report is focused on the talent development challenges faced by our domestic capital markets with an aim to set the foundation for further work and discussions among industry and policymakers as well as key training and learning organisations on the need to rethink its current strategies and programmes especially in the context of the post-Covid-19 evolving world of work.

The future of work in a “new Covid-normal” will leverage a highly skilled knowledge-driven workforce, more advanced technology, adaptive work arrangements and a more diverse, global and aging workforce. Every nation, industry and organisation will have to adequately prepare their talent force for these inevitable changes. Failure to do so will see the widening of inequalities which have been exacerbated by the pandemic. Major disruptions were faced in the education, training and learning sector, setting back progress in the achievements of SDG goals<sup>2</sup> in particular, Goal 8: “Promote sustained, inclusive and sustainable economic growth, full and productive employment and decent work for all” and Goal 4, to “Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all”.

As the demand and competition for highly skilled capital market professionals become increasingly acute, Malaysia’s capital market sector will need to fill the necessary talent gaps with the right quality of talent in order to contribute to the self-reinforcing mechanisms between financial deepening, human capital development and longer-term economic growth. It is our general view that capital market actors, including policymakers, training and development organisations and businesses should consider a more holistic approach to valuing their human capital assets and to integrate the critical enablers of financial, technological and human capital in response to the disruptions caused by the pandemic.

2 Sustainable Development Goals. UNDP.

## Methodology and limitations of the survey and other data sources

ICMR conducted this research project over several phases. It began its research process with desktop research and jurisdictional benchmarking to develop an in-depth understanding of the global trends and structural forces at play and to review its impact on Malaysia.

Our analysis is largely focused on the talent development challenges and skills gaps experienced specifically by the Malaysian capital markets. In line with this, aggregated data was collected on the current state of the talent<sup>3</sup> workforce in Malaysia's capital markets. The data focused on the composition of licensed capital market intermediaries and their licensed employees in the industry. For this report, the data is presented in an aggregated manner with no firm-level data being disclosed.

ICMR also conducted several focused group interview sessions with CEOs or C-suite level management of financial intermediaries to discuss their views on the state of talent development and the challenges they faced for the future growth of the sector. This was further complemented by discussions with the Securities Commission of Malaysia, Securities Industry Development Corporation and Malaysia Digital Economy Corporation (MDEC) given the fast-changing digital landscape and its impact on the talent required for the sector.

Armed with the insights from data and discussions, ICMR then designed a survey in collaboration with our expert panel network academician. The survey was administered online from March to April 2021 to all C-suite management of licensed intermediaries across all licensed segments of capital markets. This included dealing in securities, dealing in derivatives,

fund management, financial planning, investment advice and advising on corporate finance. Of those who accessed the online survey, we received 89% of responses and this was taken as a proxy to represent an industry-wide evaluation as the current survey respondents are representative of the various licensed intermediaries.

The survey however does not include registered capital market players such as venture capital and private equity players (VCPE) as well as some of the newer players such as equity crowdfunding (ECF) and peer-to-peer (P2P) lending. This was because the focus of the survey was to understand the talent challenges faced by the licensed intermediaries to identify their challenges in meeting the fast-changing landscape. In addition, the number of registered players of the newer business models for example, ECF and P2P companies in the capital market are still relatively small. Nonetheless given their strong growth in recent years with the potential to reshape the business models of the future, a complementary future study should be conducted to better understand their different talent challenges and needs. Unless otherwise specified, all references in the report to “the survey” relates to ICMR's survey.

This study focuses on the demand for talent – i.e. what employers are looking for from their human capital given the need to build a workforce to meet their future business objectives. As such, there are limitations to this research as it does not incorporate findings from the supply side of the labour equation – i.e. understanding what employees' needs are to give a more holistic understanding from both the perspectives of employers and employees.

---

<sup>3</sup> Data on licensed professionals by the Securities Commission was collected for this segment

## Structure of the report

The report is organised in the following manner:

- Chapter 1 presents both the theoretical underpinnings of the links between productivity growth and the role that capital markets play in economic growth. It also provides a general discussion on the role of training and educational institutions in facilitating the critical “knowledge diffusion” necessary for the sector’s growth.
- Chapter 2 discusses the structural evolutions globally in the talent landscape which are changing the nature of the workforce. These include impact of Covid-19, rise of digitalisation, demographic changes with emergence of Gen Z entering the workforce and an aging workforce population, shift towards value-based metrics and talent skills mismatch in capital markets.
- Chapter 3 presents the state of play of Malaysia’s capital market players based on data received with respect to licensed capital market intermediaries and participants as well as from insights derived from discussions with CEOs and HR personnel.
- Chapter 4 reflects the analysis of the survey findings. The survey is focused on gauging the views of the C-suite management regarding the growth industry, current talent and skills gaps, talent pipeline and discusses the assessment of training programmes.
- Chapter 5 discusses potential strategies to address challenges identified and to recommend effective solutions so that talent in Malaysia can be a driving force for capital market growth for the post-pandemic future.

# Chapter One

# Overview



1,822	20,369	890	6,350
(33)	(+56)	(20)	(20)
MIS	LAI	MIB	PON
3,605	9,542	2,409	7,654
(+210)	(-128)	(+55)	(+149)
YRF	DMN	MBA	WT
3,206	5,211	7,150	7,150
(-33)	(+156)	(-40)	(-150)
MIB	WFF	HAM	WT
2,320	112	134	2,022
(+76)	(-1)	(+3)	(-18)

AIU 1,822 12,343,000

TUS A B C D

10,000 5,000 1,000



## *“Productivity isn’t everything, but in the long run it is almost everything”, Paul Krugman*

According to the World Bank, the Malaysian economy is moving towards a high-income economy over the next five years.<sup>4</sup> While the fundamentals of the economy are driven by the accumulation of factor endowments, the shift towards a high-income economy requires a new set of focus, especially in the context of the post-Covid-19 landscape which should aim to ensure quality, inclusive and sustainable economic growth. This kind of growth will be highly dependent on higher productivity levels, where the large differences in income per capita observed across countries mostly reflect differences in labour productivity.<sup>5</sup> As Paul Krugman noted in 1994: *“productivity isn’t everything, but in the long run it is almost everything”*.

Higher productivity growth is also essential to escape the middle-income trap that afflicts many emerging economies, including Malaysia. This is dependent on three critical factors, namely human capital development, increased innovation capacity and strengthening and modernisation of institutions to function effectively.<sup>6</sup> While human capital development is listed as a factor in itself, yet without human capital development, technological assimilation and institutional change are also unlikely to succeed.

In Malaysia, the financial sector comprising both the banking and capital market sectors plays a significant role as the country transitions towards becoming a high-income economy. There are two main channels through which this sector can contribute to more inclusive, resilient and sustainable economic growth - first by directly contributing to the national productivity growth, as a strategic sector, and secondly by providing effective and efficient intermediation and capital raising services to facilitate financing of innovation activities. While Malaysia’s financial sector has always been dominated by a banking-based system, growth in more market-based financing especially as more risk is increasingly being intermediated outside the banking sector will demand more effective intermediation processes and greater innovative capacity from the sectors’ human capital.

Thus, through the lens of the human capital outcomes needed in the capital market sector, this paper further identifies the role that capital market development plays, from capital accumulation and technological progress to encouraging spill-over benefits that contribute to productivity and economic growth.

<sup>4</sup> The World Bank (2021). *“Malaysia to Achieve High Income Status Between 2004 and 2028.”*

<sup>5</sup> OECD. *Going for Growth Database*.

<sup>6</sup> OECD. *Skills for Innovation: Country Strategies*.

# The role of capital markets for economic and productivity growth

One main thesis for finance-growth nexus is that well-developed capital markets generate many economic benefits, including higher productivity growth.<sup>7</sup> Levine and Zervos (1998) found a strong correlation between financial development, growth in per capita GDP and productivity. Research that further identifies the role and mechanisms that finance plays for economic growth will have policy implications and shape future research on financial market development. Also, when taken as a whole, it will impact the dynamic interactions between finance and growth where the financial system influences growth, and growth further transforms the financial system.

Capital markets, in general, perform two key functions: provision of capital and facilitation of good governance through information production and monitoring. Tadesse (2003)<sup>8</sup> further showed that one of the mechanisms through which the capital markets affect the real economy is through the governance measures which were found to be positively correlated with productivity improvements and growth in real output.

Given the importance of capital markets for economic and productivity growth, policy focusing on producing productive and quality growth for Malaysia as a nation will need to consider measures to not only promote capital market growth in general, but also the critical enablers of the sector's own growth, one of which

is the quality of talent within the capital market sector, specifically.

Furthermore, the OECD report “The Future of Productivity” (2015) highlights the policy areas that are important to sustain productivity growth for the nation which include fostering innovation and facilitating the diffusion of new technologies to firms at the national frontier; and creating a market environment where the most productive firms are allowed to thrive.

In this context, well-functioning capital markets which operate in a global and highly dynamic environment can maximise these opportunities. **However, they will need to be underpinned by talent capabilities that are able to assess new innovative business models and technological developments and that can support the price discovery and resource allocation mechanisms of capital markets, in order to serve its important intermediary role in fostering further productivity and economic growth for the country.**

In particular, the report also identifies investment in education and skills as being especially important to ensure that workers have the capacity to learn new skills, to make the most of digitalisation and to adapt to changing technologies and working conditions. Skills and productivity are the real drivers of strong, inclusive and sustainable growth.

---

7 Dudley and Hubbard (2004). *How Capital Markets Enhance Economic Performance and Facilitate Job Creation*, Global Markets Institute, Goldman Sachs.

8 Tadesse (2003). *The Allocation and Monitoring Role of Capital Markets: Theory and International Evidence*, Journal of Financial and Quantitative Analysis.

## Training and learning institutions play a greater “transitional” role for a changing future.

In terms of capacity-building, we need to be prepared for a massive training challenge. Most sectors will not be spared by the impact of digital transformation on the nature of work and the change in skillsets required in the future. The capital markets sector is no exception, especially as it continues to transform with evolving business models and a wider integration of technology which will change the nature of jobs. In this context, training and learning institutions will play a crucial role in promoting and facilitating a “transition” toward building a more innovative, inclusive and sustainable capital market sector than currently existing.

Hence, the roles of training agencies and learning institutions with mandates to develop the professional competencies of the capital sector must take a broader approach and go beyond their core mandates of plugging the gaps for the in-demand skillsets required by the industry to grow and evolve.

As the internet becomes a more ubiquitous source of information and learning repositories, knowledge acquisition and dissemination are becoming

increasingly non-rival and non-excludable public goods. The “open innovation” concept has redefined the “ownership of information” where much is now openly available to be shared with others. It allows the flow of knowledge to be universally beneficial as opposed to being exclusive content that only prioritises the interests of individuals and companies with the confidentiality and mental silos of traditional business practices.

This requires a rethinking of the roles of training and learning institutions, especially in a post-Covid-19 landscape. Talent and learning development strategies need to embrace the rapid shift toward more flexible distance learning and assessment approaches including e-learning and microlearning solutions. It should also be ensured that the training provided is relevant in the context of the changing nature of jobs. In addition, they will have a much bigger role to play in facilitating the transfer of skills from university-level to being industry-ready, promoting lifelong learning opportunities, assessing individual skill gaps, enhancing opportunities for remote learning and simplifying the skills validation systems for ease of jobs and skills transitions, in order to inform broader reform efforts.

Chapter Two

# The Global Perspective





According to Oxford Economics' "Global Talent 2021" report, tectonic market shifts are transforming the global business landscape and are reshaping both the supply and demand for talent across the globe. These shifts range from globalisation, changing demographic trends, advances in technology, new customer needs and increased competition.

Based on the survey results by Oxford Economics in their "Global Talent 2021" report, the demand for financial services workers in emerging Asia is expected to rise by 20.9% while in North America and Europe, the demand is forecasted to decline by 8.1%. There is a clear shift in the changing demand for workers as nations such as India and China move away from relatively unskilled manufacturing jobs towards more service oriented, professionally skilled careers. This shift is a result of large populations receiving access to better and higher-quality education and the lowered barriers to entry due to technology.

The countries which will be able to take advantage of this shift in the global distribution of talent are

the ones which can increase access to education and training, and raise labour market participation to boost talent supply and to enhance productivity.

We discuss below several global structural shifts which will impact the talent landscape in capital markets:-

1. Impact of Covid-19
2. Rise of digitalisation
3. Emergence of a multigenerational workforce
4. Increasing value of human capital as an "intangible asset"
5. Talent mismatch requiring "home growing" skillsets

These structural trends are complex, critical and are all interconnected. For instance, Covid-19 has accelerated the rise of digitalisation, and having a multigenerational workforce has forced employers to understand value-based metrics. While these trends are not specific to the capital markets, it would undoubtedly impact the talent needs of Malaysia's capital markets.

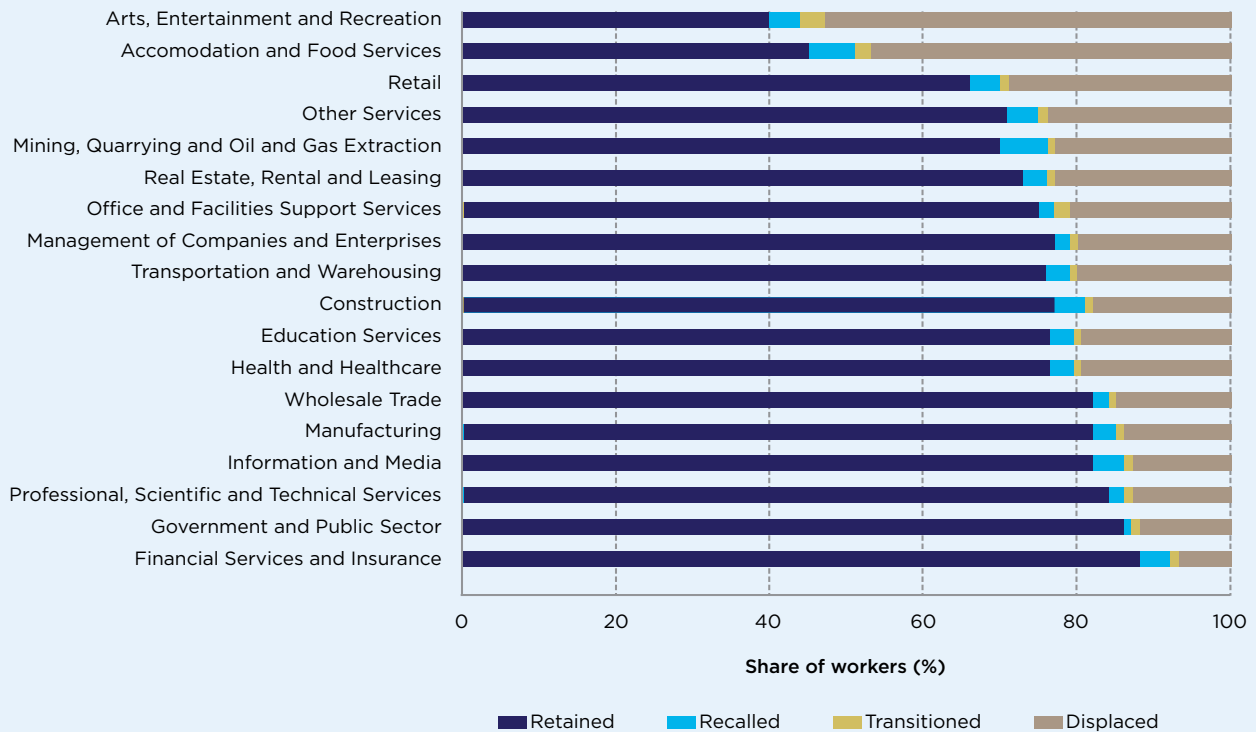


## Impact of Covid-19 on talent and work

The Covid-19 pandemic has significantly transformed the way we work and impacted the talent and learning landscape. Employees must figure out how they can adapt to rapidly changing conditions, while companies must learn how to place them into new roles and functions. The changing nature of work is about more than remote working or the impact of digitalisation.

According to the World Economic Forum’s “The Future of Jobs Report”, **US financial services and insurance** was the **least affected industry based on proportion of retained workers** throughout 2020.

**Figure 1:**  
**Affected workers by sub-industry in the US, 2020**

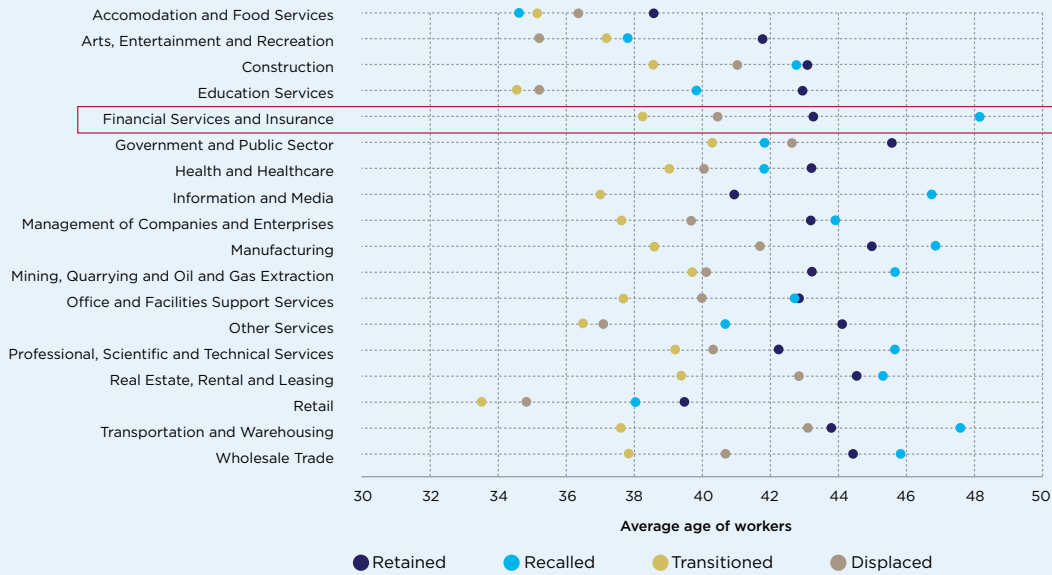


Source: WEF, 2020

However, workers who were either transitioned or displaced were, on average, within the millennial age range. Older, more experienced employees

were more likely to be retained or recalled back to service regardless of industry,<sup>9</sup> as seen in Figure 2.

**Figure 2:**  
Affected workers by sub-industry and age in the US (2020)

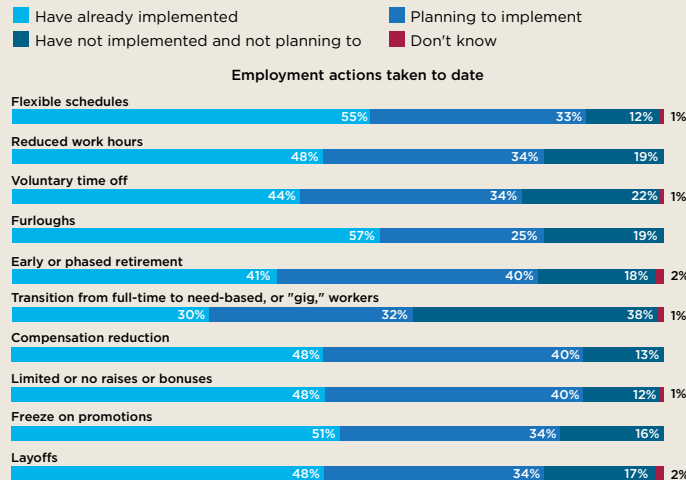


Source: WEF, 2020

Based on Deloitte’s 2021 banking and capital markets outlook, it was noted that the Covid-19 pandemic affected global megatrends which in turn affected the behaviour of the industry. For example, the

pandemic accelerated digitisation and virtualisation of the workforce due to social distancing requirements. The focus on cost reduction was also increased to ensure business continuity.

**Figure 3:**  
Talent changes implemented by banks globally in response to Covid-19



Source: The Deloitte Center for Financial Services Global Outlook Survey, 2020

9 Zahidi, S., Ratcheva, V., Hingel, G., & Brown, S. (2020, October). *The Future of Jobs Report*. World Economic Forum.

To address these trends, banks have continued to adjust their attitude towards hiring and maintaining existing talent. While 38% of respondents said their company did not intend to transition from full-time employment to gig-based employment, **at least 48% had already implemented reduced work hours and flexible schedules.**

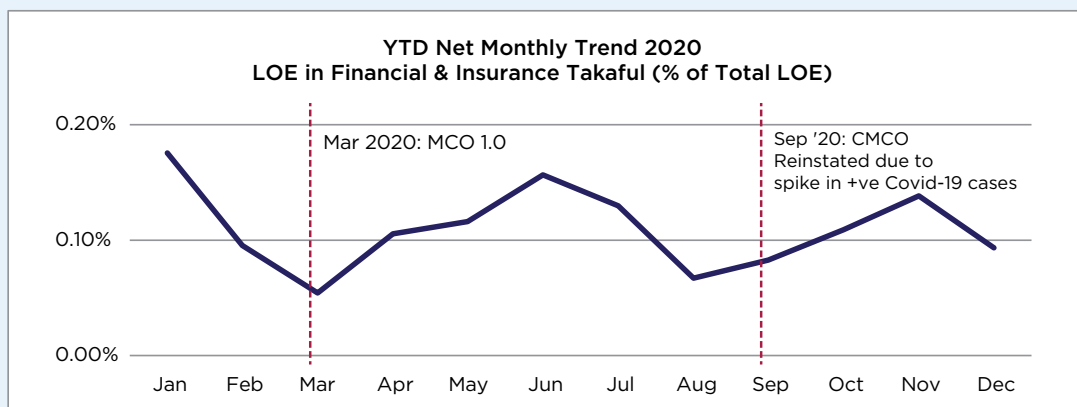
In Malaysia, the rising Covid-19 cases have led to numerous policy responses in the forms of lockdowns as a method of curbing the spread of the virus. This has impacted various workers and businesses due to imposition of high restrictions on mobility.

Younger workers without significant work experience have been badly hit by the Covid-19 pandemic. A reduction in entry-level jobs in the labour market will have long term implications on youth employment or underemployment.

There was an increase in unemployment amongst graduates who graduated in 2020 (4.4%) compared to those who graduated in 2019 (3.9%). It is likely that this increase could have been attributed to the pandemic, as this was the highest unemployment rate amongst graduates in 5 years.<sup>10</sup>

The Malaysian financial sector was not immune to the impact of Covid-19 in the workforce. While the financial and insurance takaful industry did not make a significant proportion of those reporting for loss of employment from the overall population, Figure 4 shows there was a rise in unemployment from this sector following the announcement of the first Movement Control Order (MCO) in March 2020, and once again following the announcement of the Conditional Movement Control Order (CMCO) in September 2020.

**Figure 4:**  
**The financial and insurance sector as a percentage of contribution to the overall loss of employment (LOE) report**



Source: Employment Insurance System, ICMR's Calculations

Recent research by ISEAS-Yusof Ishak Institute highlighted that those who are particularly vulnerable to the economic impacts of Covid-19 are low-income earners and workers with low levels of educational attainment.<sup>11</sup> Young workers without work experience such as graduates will also bear increasing impact from the pandemic.

This further supports the view that investment in education, training and skills-building programmes are particularly important to ensure that Malaysia's working population, especially the more vulnerable segments of the workforce, can adapt to the fast-changing nature of work post-Covid-19.

10 Department of Statistics Malaysia (DOSM)

11 A. Abdur Rahman (2020). *The Vulnerability of Jobs to COVID-19: The Case of Malaysia*, ISEAS-Yusof Ishak Institute.

As firms manage costs and supply chain disruptions arising from government policies in managing Covid-19 such as lockdowns and movement control measures, the acceleration of automation can also have long-lasting impact to the nature of work. Changes to the nature of work due to technological advancements were already underway pre-Covid-19. However, Covid-19 has propelled further adoption of technologies as companies began finding ways to conduct their businesses with less physical proximity. To meet the changing demands of jobs for the future, workers need to transition into roles that require new skills especially advanced cognitive skills, compared to traditional skillsets which can be replaced by technology.

Efforts to upskill and reskill the population were illustrated in Malaysia's National Economic Recovery Plan, *Penjana*, championed by the Human Resources Development Fund (HRDF). The plan introduced an extension of the wage subsidy program and additional incentives for training and hiring that focuses on youth, those who are unemployed as a result of the pandemic and gig economy workers. While *Penjana* is a starting point to address Covid-19 employment related issues, there is an opportunity for policymakers to explore how the workforce can complement the acceleration of digitalisation, as opposed to falling victim to technological advancements.

Globally and within Malaysia, a rise in unemployment rates was witnessed as a result of Covid-19. This was accompanied by an acceleration of adoption of digital technologies with potential long-term impacts exacerbated with rising automation risk. This calls for a greater need for a coordinated effort to reskill and upskill the population from more routine skillsets to more cognitive functions, especially in the services sector.

## Rise of digitalisation

Covid-19 was an accelerator of digitalisation as nations globally began to go into lockdowns and businesses were forced to adapt and work from home. As corporations coped with the shutdown of physical interactions, organisations began adopting digital initiatives. However, the impact of digitalisation was already pre-existing before the pandemic and will move significantly beyond digital initiatives related to remote working.

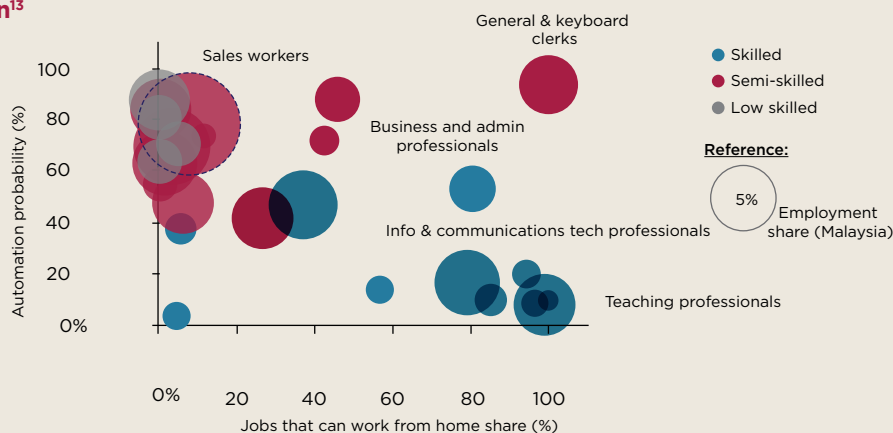
According to a report published by McKinsey Global Institute<sup>12</sup> in 2017 before the onset of the pandemic, by 2030 there will be as many as 375 million workers—or roughly 14 percent of the global workforce—that may need to switch occupational categories as digitization, automation, and advances in artificial intelligence (AI) disrupt the world of work. This was followed by another survey by McKinsey Global Survey on future workforce needs, which found that nearly nine in ten executives and managers stated that their organisations are either facing skill gaps already, or are expecting gaps to develop within the next five years.

The impact of digitalisation combined with changing market trends and new emerging business models will affect many elements of the future of work, including the ways that workers utilise technologies to communicate, create, and transfer information, and deliberate ideas for strategic initiatives.

Covid-19 adds additional layers of complexity to the impact of digitalisation on the workforce with varied consequences. Firstly, at a very fundamental level, Covid-19 is laying bare the deep-rooted labour market fragilities and structural inequalities which accelerated digitalisation and automation would only further exacerbate. This would require a broader social-economic national response which addresses the challenges of permanent job losses arising out of the pandemic. In this context, policies which involve both a strengthening of employment and social protection systems as well as complementary upskilling and reskilling programmes to redeploy redundant workers into new growth areas with flexible working arrangements are critical to ensure our workforce can transition into higher-skilled jobs equipped with the necessary skillsets.

An important implication is the impact on job security especially with Covid-19's impact on automation which requires workers to continuously adapt and adopt lifelong learning initiatives in a digitally enabled environment. As shown in Figure 5, Malaysia's automation risk was prominent amongst the low skilled and semi-skilled workers, such as in certain areas of sales, where worryingly, the nation currently has a high percentage of workers.

**Figure 5 :**  
**Automation probability versus jobs that can work from home share and Malaysia's employment share, by occupation<sup>13</sup>**



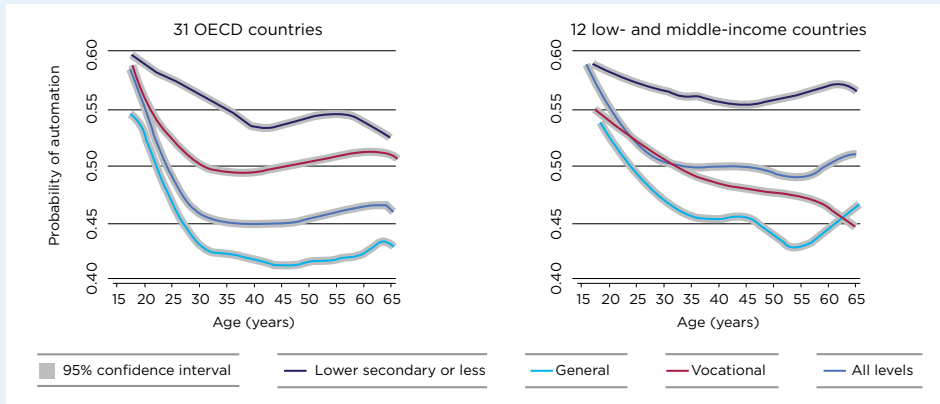
<sup>12</sup> McKinsey Global Institute (2018). *Jobs lost, jobs gained: Workforce transitions in a time of automation*.

<sup>13</sup> Khazanah Research Institute (2020). *Work in an Evolving Malaysia*. Kuala Lumpur: Khazanah Research Institute. *The State of Households 2020 Part II*. Khazanah Research Institute.

Secondly, it has been observed that educational attainment will play the biggest influence on automation globally. As seen in Figure 6, age and educational attainment are interlinked, and younger people face the highest risk of automation as more entry level jobs are held by youth and these entry level jobs have a greater proportion of automatable

tasks. Low skilled workers will bear the brunt of the changes and benefit little from the jobs created in high-tech industries. A study by ILO found that the probability of automation risk increased for those in lower secondary or less, but decreased as individuals aged.<sup>14</sup>

**Figure 6 :**  
**Risk of automation by age and type of education**



Source: ILO, 2020

Thirdly, looking to the future, talent development and management for a post-Covid-19 landscape will need to increasingly leverage more advanced technologies and talent analytics to become more data-driven and data-informed in order to build macro-talent management policies, programmes and initiatives for the country. There is an opportunity for Malaysia to manage the transition towards automation. It is crucial that the nation finds ways for the workforce to complement technological advancements.

In order to mitigate the changes brought on by automation, policy makers and workers need to consider the following:

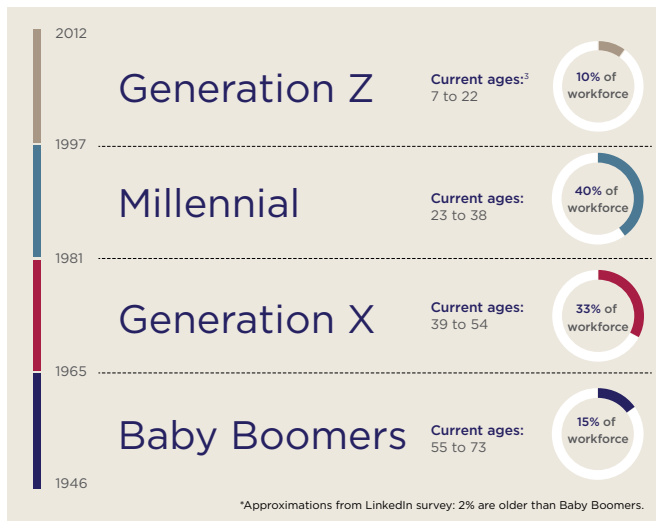
1. Digital transformation will lead to certain functions being obsolete, but also the creation of new jobs.
2. To succeed in the digital era, people will need to reskill and upskill themselves to be indispensable.
3. Life-long learning opportunities need to be promoted and barriers to reskilling and upskilling need to be addressed.

14 International Labour Organization. (2020). *Global Employment Trends for Youth 2020: Technology and the future of jobs*.

## Emergence of a multigenerational workforce

Today's workforce will encompass multiple generations, as Gen Z enters the workforce along with the Millennials, Generation X and Baby Boomers.

**Figure 7 :**  
**Social generation classifications**



Source: Deloitte, 2020

Declining birth rates and an aging population will dramatically change the demographic profile of the workforce as most sectors will be faced with a diminishing pool of younger talent. For example, in Malaysia the demographics of our workforce aged 35 and above stands at 50.4% compared to 48.6% in 2017.

Managing an increasingly multigenerational workforce brings a new set of new challenges for countries, sectors, and organisations. There will be a growing need to balance creating sufficient opportunities for the younger workforce to advance while at the same time ensuring that the older workforce can still be relied upon given tight labour markets, and have relevant skillsets to contribute productively in an environment where digital and tech-related skillsets are core.

In addition, Covid-19 will lead to the impact of a multigenerational and diverse workforce becoming

increasingly complex. As the motivations and drivers of work for generations from Gen Z to Baby Boomers differ, talent development strategies which rely on segmentation anchored purely on a generational approach could have a misleading effect. While generational cohorts tend to share a common outlook based on processing a set of common life experiences, empirical research refutes the notion of generational difference.<sup>15</sup> The concept of generational cohorts does not explain the nuances of experiences held by smaller divisions of people. Distinctions in national culture and unique regional experiences may be more relevant when determining the values, beliefs, motivations, and drivers of work for individuals.

Instead, there may be a need for governments and organisations to understand the underlying beliefs, motivations and drivers of work for multiple generations, including their abilities to adapt to rapid changes needed in response to Covid-19.

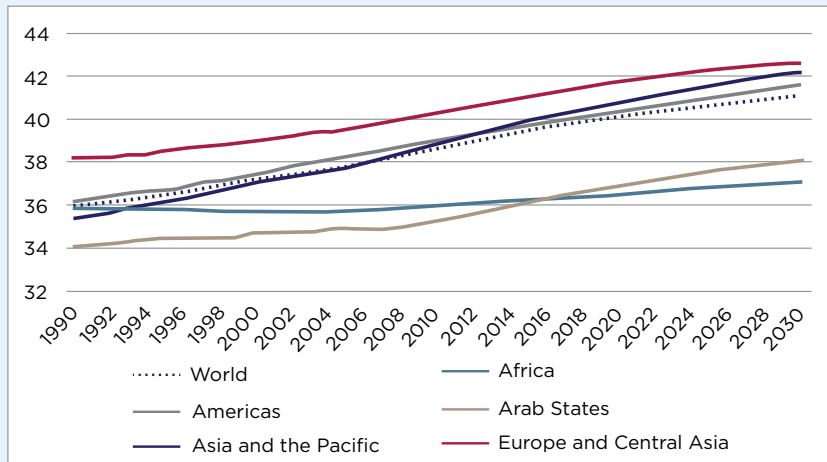
Companies wanting to be competitive in attracting and retaining the best talent will be forced to study the values important to Gen Z workers and how these values can be leveraged to work collaboratively with other generations. For instance, Deloitte recently conducted a survey on Gen Z and concluded some important Gen Z aspirations as the following:<sup>16</sup>

- Career Aspirations: Gen Z prefers to work in industries that they interact with in their personal lives opposed to industries they aren't frequent consumers of
- Career development: Gen Z desires diverse and entrepreneurial opportunities with the safety of stable employment and will remain loyal to a company if they can offer this
- Working styles: Gen Z prefers individual tasks over team-based activities; however, they will value physical connection. They prefer independence but not isolation
- Core values: Gen Z no longer forms opinions of a company solely based on the quality of their products / services but also on their ethics, practices and social impact

15 Mlodzik, K. Korn Ferry International. *A Scholarly Investigation of Generational Workforce Differences: Debunking the myths*.

16 Gomez, K., Mawhinney, T., & Betts, K. Deloitte (2020). *Welcome to Generation Z*. Deloitte.

**Figure 8 :**  
**Average age of labour force, 1990-2030 (Projections for 2018 and beyond)**



Source: ILO, 2019

- Behaviour: Gen Z’s attachment to social media will pose implications to how they interact and want to be perceived
- Diversity: Gen Z defines diversity along different lines than generations before them

Contrasting the emergence of this younger work force, longer lifespans have contributed to a later retirement as seen in Figure 8, as the older generation stays in the workforce for longer due to multiple factors including tighter labour markets and inadequate retirement savings. People may be choosing to retire later because work provides both economic independence and security, but also gives meaning and purpose to people’s lives.<sup>17</sup>

Companies will now need to deal with the realities of a multi-generational workforce. While younger people are seen to be more technologically inclined, entry level roles normally filled by this generation will see more automation moving forward. Companies will also need to determine how best to attract and retain the younger demographic into their organisations while including reskilling and upskilling initiatives to prepare the older workforce for a more digitally-driven future.

As the future of work will comprise multiple generations, organisations will need to employ different strategies to retain and develop talent in the face of changing skillsets. It is also important to consider that “upskilling and reskilling” are not only accomplished through formal training. Different modalities include blended learning and knowledge-transfer strategies between generations to transfer tacit knowledge as well as peer mentoring and learning, sponsorship, or assembling cross-functional teams.

More importantly, companies that are able to reap the significant benefits of a multi-generational workforce will make the most of the collaboration of fresh innovative thinking with the wisdom and tacit knowledge that comes from experience.

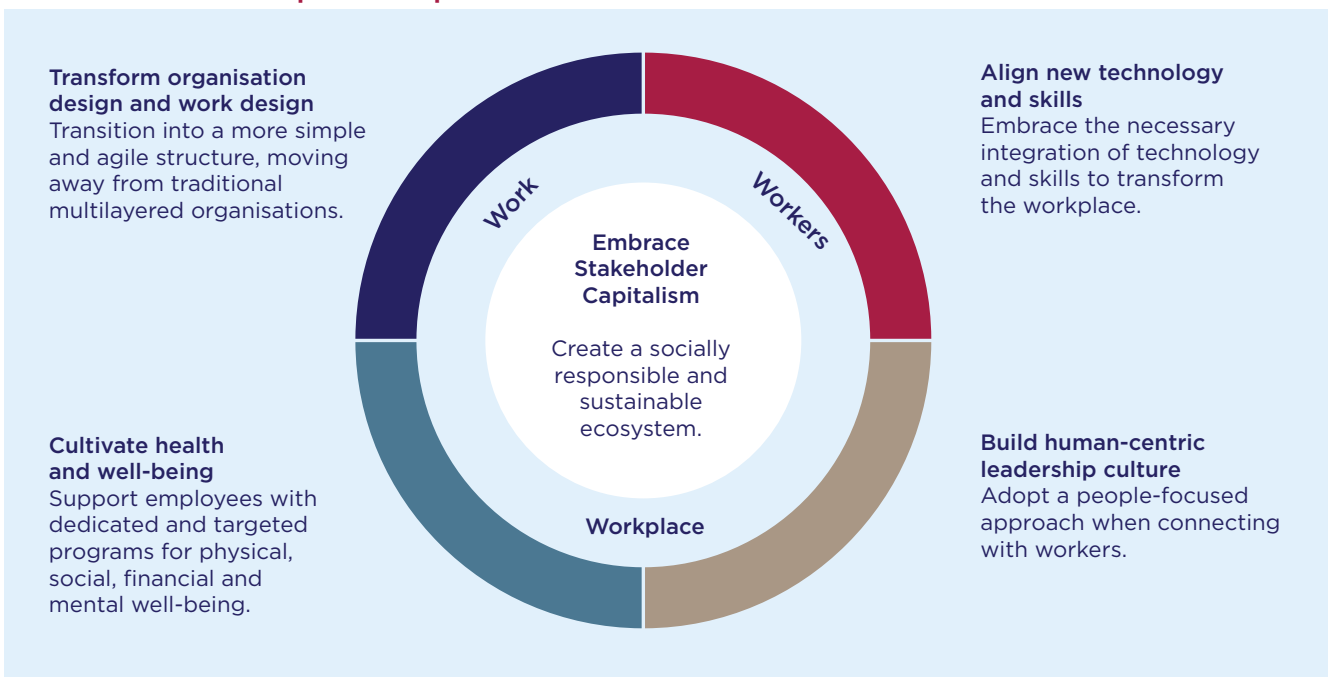
<sup>17</sup> International Labour Organization. (2019, February). *Supporting longer working lives: Multistage approaches for decent and productive work*.

## Increasing value of “human capital” as an intangible asset

Uncertainty as a result of Covid-19, changes in workforce demographics, and a shorter shelf life for knowledge have placed a premium on reskilling and upskilling. Human capital is increasingly seen as an integral component of a business, and many companies view it as an intangible asset. However, **frameworks for human capital management have been lagging as the corporate agenda**

consistently prioritises financial and operational metrics over the true value of human capital. In recent years, however, there has been a greater push to introduce human capital as a component of financial reporting and this could create a culture where companies are accustomed to better understand the value of their people.

**Figure 9 :**  
**Framework for human capital development**



Source: WEF, 2020

As demonstrated in Figure 9, the World Economic Forum (WEF) recommends a framework for human capital development that prioritises work, workers and the workplace. This should be accompanied with an accounting framework for human capital that includes promoting individual dignity, well-being and the ability to realise human potential through work. For companies, this can ensure that human capital remains at the forefront of strategic

decisions, and it **expands HR’s role from being a steward of employment to being a steward of work.**<sup>18</sup>

There is also a big push toward introducing robust measures of human capital by major groups including policymakers, regulatory bodies, international organisations and investor communities.

18 World Economic Forum. (2020). *Human Capital as an Asset: An Accounting Framework to Reset the Value of Talent in the New World of Work*.

In 2020, the US Securities Exchange Commission (SEC) proposed expanding reporting requirements for public listed companies to publish data on a range of non-financial information including greenhouse gas emissions and on human capital disclosure, including workforce turnover, skills and development training and workforce demographics. This is in recognition that a company's intangible assets, including human capital and culture, are estimated to comprise more than half of a company's market value on average.<sup>19</sup> In addition, the EU's non-financial disclosure requirements are designed to promote greater transparency in organisational efforts related to social responsibility and the treatment of employees as well as board of director diversity.

As organisations face greater scrutiny by shareholders, institutional investors and activists to provide higher levels of transparency such as through Environmental, Social, and Governance (ESG) reporting or to follow SDG goals, there is also increased pressure toward embracing "stakeholder capitalism" for long-term value creation. This is where the objectives of the company are no longer to pursue pure shareholder maximisation of profits but toward maximising shared value between the organisation, the employees and a broader group of stakeholders.

This has implications for how organisations value its talent workforce. As human capital becomes a core component of a corporation's value, the role of learning and development will also be enhanced. Learning and development must be embraced throughout organisations in a strategic manner for the following reasons:<sup>20</sup>

1. Attracting and retaining talent;
2. Developing people's capabilities;
3. Creating a values-based culture;
4. Building an employer brand; and
5. Motivating and engaging employees.

To make their organisations more effective in the face of sweeping business change, HR leaders will need to rethink their techniques for managing talent and ensure they are aligned with the new strategic objectives of their organisation. Increasingly, they will need to **develop more evidence-based approaches to manage global talent— drawing on improved analytics to identify talent segments and gaps, optimise resource allocation, integrate workforce plans and manage unavoidable risk.**<sup>21</sup>

In relation to the "future of work", and as part of a broader framework than human capital, Kudyba and Fjermestad et al, (2020) introduced the need to study "intellectual capital" in greater detail whereby the sub-components of "intellectual capital" are:<sup>22</sup>

1. Human Capital: Skills and knowledge of employees
2. Social Capital: Ways individuals and teams collaborate and work together
3. Structural Capital: Technologies, systems and information resources available
4. Relational Capital: Ways organisations work with partners, vendors and consumers

This broader definition of "intangible assets" is an extension of the human capital framework and appears to be more relevant to the role they increasingly play for organisations, sectors, and economies. This becomes even more critical as Covid-19 accelerates the shift in the "future of work" landscape where investments in "intangible assets" correlate with productivity and sector growth.

19 "A company's intangible assets, including human capital, are now estimated to comprise on average 52% of its market value", World Economic Forum (2020). *Human Capital as an Asset*.

20 van Dam, N. (2018, August). *Elevating Learning & Development: Insights and practical guidance from the field*. McKinsey & Company.

21 Oxford Economics. (2021). *Global Talent 2021: How the new geography of talent will transform human resource strategies*.

22 Kudyba, S. (2020). *COVID-19 and the Acceleration of Digital Transformation and the Future of Work*. Information Systems Management, 37(4), 284-287.

## Talent mismatch requiring increasing homegrown skillsets

Given the structural shifts which are fast changing the business environment, **employers are demanding new skills** from their employees. Based on a report by Oxford Economics,<sup>23</sup> the paradox is profound: On the one hand, 40 million workers in the industrialised world are unemployed, according to recent estimates by the International Labour Organization. Yet executives and managers tasked with hiring new workers often say they are unable to find the right people with the proper skills to fill their vacancies.

As market transformation continues to redefine the supply and demand for talent, the **sources from which talent might be recruited are also realigning**. More talent will be “home grown” in the developing world, and as a result, research by Oxford Economics forecasted that over the next decade, new and sometimes unlikely regions of the world will generate a surplus of talent.

However, as the world slips toward an impending skilled labour shortage, further aggravated by the pandemic, both developed and developing economies alike will be hit by permanent structural shifts in the supply and demand for labour. Globally, in 2030, Korn Ferry research forecasts **talent shortages of 85.2 million skilled workers**, resulting in US\$8.452 trillion in unrealised revenue across twenty of the world’s major economies.

C-suites worldwide are conscious of the challenge posed by the talent crunch: 84% of corporate leaders felt that to survive in the future of work, their company will need more **highly skilled workers** as a proportion of their workforce.

In addition, according to the data, **India is the only country predicted to have a surplus of highly skilled workers by 2030**, and companies overseas will be fighting hard to retain the talent they do have. Even with advances in technology enabling people to work together across borders, planning to import talent or set up new operations where the talent supply is more plentiful, there is still a need to develop local talent.<sup>24</sup>

“Home growing” the talent workforce will be a critical imperative for rebuilding the nation post Covid-19 which includes policies related to moving up the skills ladder, improving access to high-quality education and further investments in digitally enabled training and development. Given the high rate of unemployment of 4.4% amongst graduates observed in the year 2020, there are still opportunities to reskill individuals within the population to meet the skills of the future.

For organisations, the development of an internal talent pipeline will be instrumental in increasing homegrown skillsets. **Graduate employability is highly dependent on higher education** institutions through developing services for institutional career guidance, reinforcing employability through curricula, encouraging networking that enables students to interact with employers and real experiences in the labour market, supporting students in their personal development and encouraging critical thinking regarding their learning experiences, as a whole. Overall, universities face the challenges of teaching an increasingly diverse student body more complex thinking and problem-solving skills. Employers are requesting for more action to be done by governments to develop graduate employability; higher education institutions should be working to bridge the gap between employability of graduates and employers’ competency requirements.<sup>25</sup>

Capital markets have a significant role to play in terms of creating an ecosystem for future innovation and job creation if there are greater investments in sectors linked to the “new economy” which will fuel growth well beyond 2021. Higher education institutions will need to provide high calibre graduates for the next generation of the workforce.

23 Oxford Economics. (2021). *How the new geography will transform human resource strategies*.

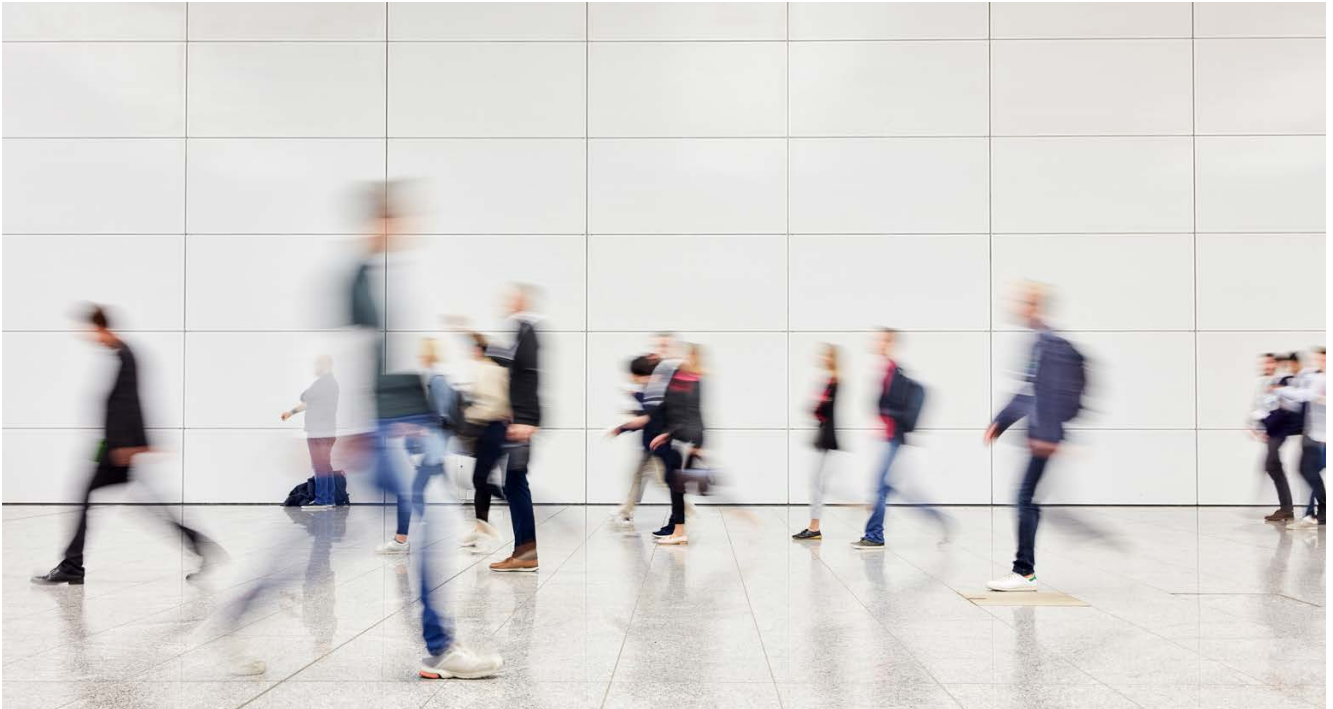
24 Korn Ferry. (2018). *The Global Talent Crunch*.

25 Abelha, M. (2020). *Graduate Employability and Competence Development in Higher Education*. Multidisciplinary Digital Publishing Institute.

Chapter Three

# State of Play of Malaysia's Capital Market Players





## Overview of talent trends in the financial services

For Malaysia, the talent crunch across the economy as a whole could constrain the country's economic growth by US\$6.10 billion or 1% GDP by 2030. Korn Ferry<sup>26</sup> stated that companies that fail to forecast, develop, and evolve their talent management strategies will stumble into the future of work blind to its realities, and without the time to make up lost ground. The time for a major rethink of the talent pipeline is now.

The Asian Institute of Finance (AIF) conducted a survey in 2015 of 600 employers across the **Malaysian financial services industry and discovered a common problem**. They all **struggle to find skilled talent** to fill various job positions. According to the survey, more than three-quarters (76%) of employers say they experience talent shortages, which poses a major challenge for the industry's prospects. The report also found that:

- 93% of employers believe that **talent shortages were impacting productivity** to either a high or medium degree
- 55% of employers say **that filling job vacancies over the next few years would be 'difficult' or 'very difficult'**
- Filling the talent gap has only seen marginal improvement over the years

The Financial Accreditation Agency (FAA) notes that these issues are still prevalent today.<sup>27</sup> One key area recommended was to make the upskilling process more effective and efficient. The FAA also found that too often, financial services organisations waste their time and money by sending employees for training programmes without questioning their effectiveness. There is a need to ensure that effective upskilling leads to building up the capabilities of internal talent.

26 Korn Ferry. (2018). *The Global Talent Crunch, Country Perspective: Malaysia*.

27 Finance Accreditation Agency (FAA). (2020) *Has Upskilling been Effective in Solving Talent Shortage?*

## Training ecosystem in the capital market

As part of the licensing regime, licensed capital market participants have to undertake the **Continuing Professional Education (CPE)** programme aimed at fostering a culture of continuous learning and enhancing the knowledge, skills and aptitude of the participant. Within the training ecosystem, there are several training providers that offer capital market programmes and these programmes, which also carry CPE points. SIDC, established in 1994 as the learning and development arm of the Securities Commission Malaysia (SC) and incorporated in 2007, is one such training provider.

In 2017, SIDC introduced a new **Industry Competency Framework (ICF)** to provide universal guidance for competency capabilities for capital market professionals in order to further enhance competitiveness in the industry. The framework details the required key knowledge, skills and attributes for relevant roles under the regulated capital market activities, with its specific set of indicators and measurement criteria. One of the framework's key features is the competency dictionary, a tool that describes the core competencies related to specific roles along with their associated required competency level.

Then in 2019, SIDC launched its **Capital Market Competency Management System (CMS)**, an innovative online industry-wide utility platform that centralises the Industry Competency Framework (ICF), assessment and development activities on a common hub. Based on the ICF, the CMS empowers individuals and/or corporations to assess and identify their own or their employees' existing competency levels and development areas.

There are also various institutional arrangements that have been put in place to augment the overall learning and development ecosystem.

The **Asian Institute for Finance (AIF)** was jointly established by Bank Negara Malaysia and Securities Commission Malaysia in November 2008. AIF conducts applied research and prepares case studies relating to talent management and human capital development issues in the financial services industry. AIF also works with the financial services industry to enhance the development, implementation and advocacy of professional standards and business ethics. AIF also develops and monitors capacity building initiatives created by Central Bank of Malaysia and designs to drive efficiency, effectiveness and the structural development of the industry. However, in 2019, AIF was disbanded.

The **Finance Accreditation Agency (FAA)**, an independent quality assurance and accreditation body, supported by Bank Negara Malaysia and the Securities Commission Malaysia, was established in August 2012. The founding members of FAA were initially part of the Accreditation department in the AIF. To avoid a conflict of interest, as well as its potential to play a larger role as an independent entity, the FAA was incorporated to develop higher learning standards, and spearhead the standardisation and certification efforts for the financial services industry.

The FAA is backed by a Technical Committee of financial experts, professionals and leading academics from major financial centres around the world to enable them to provide the highest quality in standards, and to maintain a global outlook with learning programmes that translate across borders. Since its inception, FAA's ambit has expanded substantially to embrace a wide range of accreditation formats, from programme accreditation to institutional and individual accreditation. To date they have accredited 500 individuals and have 100+ accredited programmes.



They also have 156 industry-specific learning standards that ensure structured learning and development.

The **Financial Services Professional Board (FSPB)**, an industry-led voluntary initiative, was also launched by Bank Negara Malaysia and Securities Commission Malaysia in September 2014. FSPB is focused on development and advocacy of professional and ethical standards across the financial services industry. FSPB issued the Code of Ethics for the financial services industry in 2015, outlining a set of five broad fundamental principles to which financial services industry institutions and

individuals should adhere to. This was followed by Guidance Notes to Code of Ethics in 2017 to provide additional guidance and explanation on how each of the principles in the code of ethics applies in practice through appropriate policies, procedures and processes. In 2018, the FSPB Professional Code for the Financial Services Industry was issued to instil core minimum standards of conduct, enhance confidence and promote sustainability across the sector by promoting a strong culture of professionalism. 10 core minimum standards of professionals were set out for the banking, insurance, capital markets and Islamic finance. FSPB was disbanded in 2021.

## Key insights on Malaysia's capital market licensed intermediaries and their employees

The Capital Markets and Services Act 2007 which took effect on 28 September 2007, introduces a single licensing regime for capital market intermediaries. Under this new regime, a capital market intermediary will only need one licence to carry on the business in any one or more of the regulated activities. Employees of a licensed intermediary undertaking capital market activities are also licensed by the SC.

With that, ICMR, after signing a non-disclosure agreement with the SC to not disclose firm-level data, received data on the profiles of licensed capital market intermediaries from 2015 to 2019.

Key findings indicate:

- Capital market intermediaries have small numbers of employees which leads to lack of economies of scale from the investments**

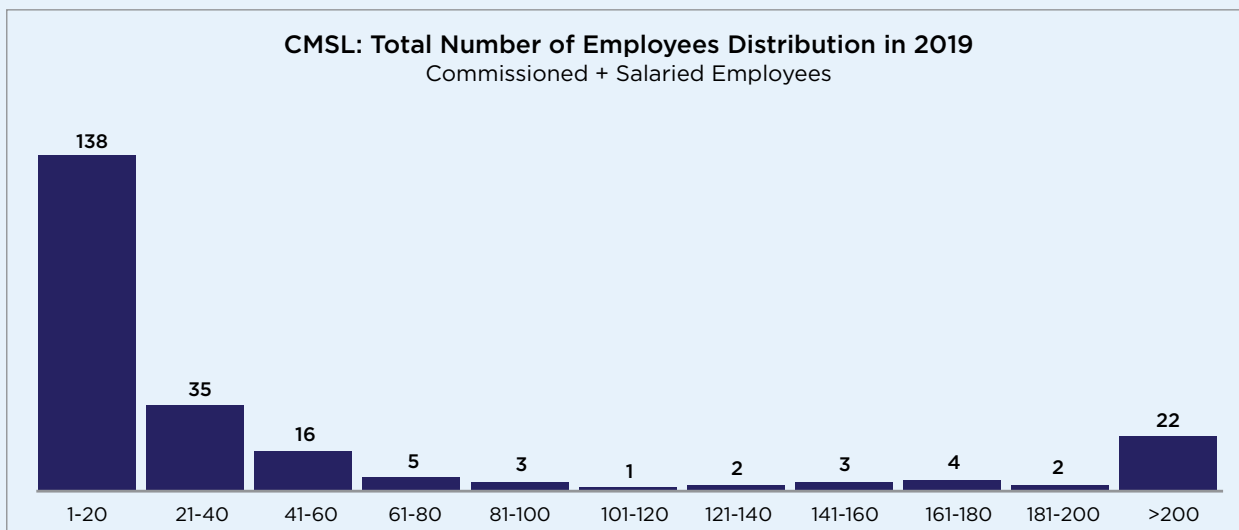
**required from a learning and training and development perspective.**

Measuring the size of intermediaries by their total number of employees, the data shows that **59% of capital market intermediaries have less than 20 employees**. As shown in Figure 10, only **22 intermediaries have more than 200 employees**. This indicates that in terms of employee numbers, capital market intermediaries are quite small.

It is interesting to note that the 5 largest intermediaries in terms of employees have more than 1,000 employees and that 4 out of 5 of them are investment banks.

**As capital market intermediaries have a low number of employees, they may lack the economies of scale with regards to training and development as well as building and nurturing a talent pipeline.**

**Figure 10 :**  
**Distribution of licensed intermediaries based on number of employees**



Source: SC data on licensed capital market intermediaries 2015 - 2019 ICMR calculations 2021

## 2. Digitalisation will have a greater impact on employees in certain functions

While digitalisation is transforming most industries, the extent of “big bang” disruption in capital markets lags other financial services while the overall sector trails sectors such as consumer goods, media and retail businesses.<sup>28</sup>

The sector has been, to a certain degree, shielded by the tighter regulatory landscape and lack of network effects. However, there are signs that the incumbent business models in capital markets will be faced with another form of disruption, i.e. “compressive disruption”.<sup>29</sup> This type of disruption is a more subtle yet insidious form of disruption, which is forcing change in the capital markets sector. Signs of “compressive disruption” include stagnating revenues and falling margins and growing competition from more digital business models and other forms of non-bank competitors. In Malaysia, this trend can already be seen by the diverse range of parties which have submitted applications for the digital bank license, including technology firms and FinTech players.<sup>30</sup>

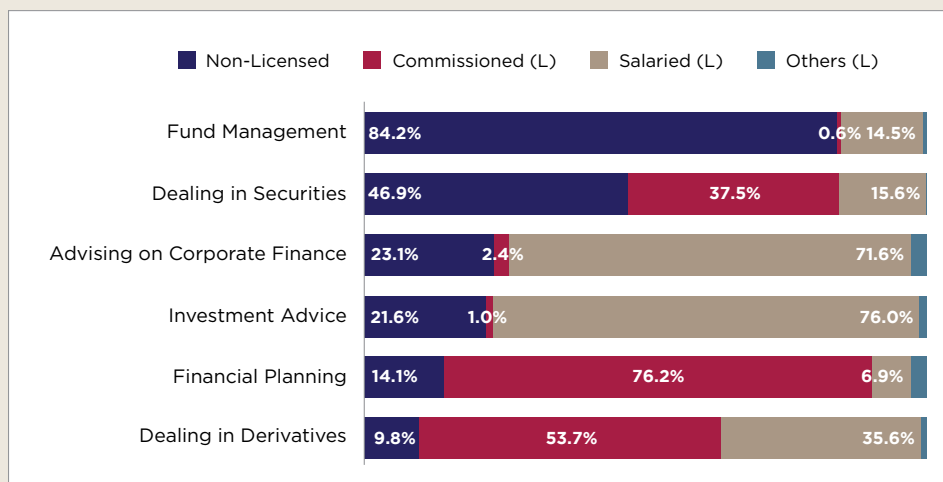
Currently, the levels of digitalisation in incumbent business models are still operational to enable

more efficient processes. Digitalisation as a result of innovation driven by new technological applications (such as AI and blockchain) and the convergence of traditional and alternative business models are still relatively nascent and presents a key opportunity for capital market companies to adopt digital transformation strategies.

Data from the SC shows that the capital market intermediaries have employees who are both licensed holders as well as non-licensed holders in their organisation. Licensed holders are then either salaried or commission-based whereas the non-licensed holders perform non-capital market activities such as administration, human resources and finances to name a few.

Juxtaposing employee composition against core activity based on the data provided by the SC, Figure 11 illustrates that the categories of **Fund Management and Dealing in Securities have the highest percentage of non-licensed employees. Non-licensed employees predominantly operate in back-office functions - which are the functions most likely to be impacted by higher levels of process automation such as Robotic Process Automation (RPA).**

**Figure 11 :**  
**Composition of total employees by core activity**



Source: SC data on licensed capital market intermediaries 2015 - 2019, ICMR calculations 2021

28 Accenture. (2017). *Compressive Disruption: Learn to Thrive Under Pressure*.

29 Accenture. (2017). *Compressive Disruption: Learn to Thrive Under Pressure*.

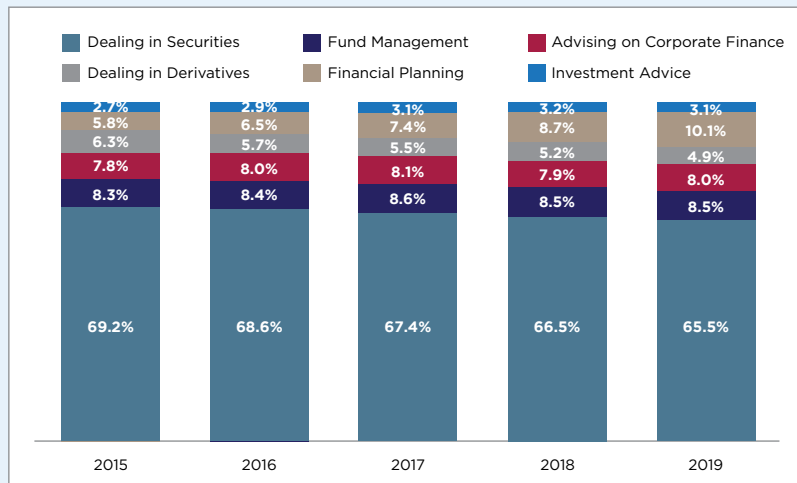
30 Bank Negara Malaysia. (2021). *Bank Negara Malaysia receives 29 applications for digital bank licenses*.

With regards to licensed holders, the **bulk of licenses are in dealing in securities**. The advent of digital models – which tend to also undertake more passive investing, could also impact the need for licensed holders in the longer-term who are focused on active investing but not staying relevant or aligned toward future shifts

in investor demand, for example in the areas of sustainable finance and ESG.

From a talent development perspective, **there is a need to ensure that these licensed holders can be reskilled so that they can move to other jobs either within or outside the industry thus strengthening labour mobility.**

**Figure 12 :**  
**Composition of licensed holders**



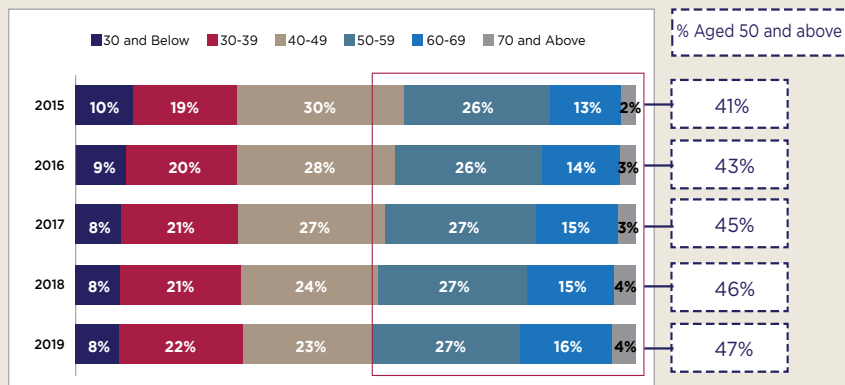
Source: SC data on licensed capital market intermediaries 2015 - 2019, ICMR calculations, 2021

### 3. Aging of licensed holders

With regards to licensed personnel, the data also showed that, the industry is faced with an aging demographic as the percentage of those aged 50 and above has been increasing steadily in the last 5 years from 41% to 47%. In addition, the

data suggest that the industry has been unable to attract younger talent to become licensed capital market participants as the percentage of those 30 and below has decreased from 10% in 2015 to 8% in 2019.

**Figure 13 :**  
**Age Group Composition (% of Total Licensed Holders)**



Source: SC data on licensed capital market intermediaries 2015 - 2019, ICMR calculations, 2021

The lack of young talent becoming licensed capital market participants has long-term implications, not only on building and nurturing the talent pipeline critical for growth of the industry, but it also creates a bigger mismatch between the skillsets of those who are offering financial and capital market services and the younger investors who are increasingly entering the market with new behaviours and attitudes.

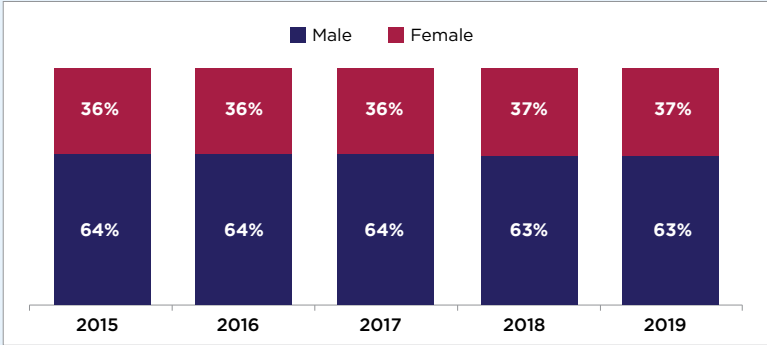
In our research report entitled “Retail Investor Behaviour in 2020: Data Insights”, it was seen that young investors were entering the capital market across various market segments. In 2020, Bursa Malaysia saw a surge in new individual CDS account openings, with a 132% increase year-on-year in 2020 of which 64% of these new accounts opened in 2020 were by those aged 25-44 years old. Additionally, investors aged between 35-54 years old were the largest contributor to retail average daily trading value (ADV), contributing about half of the ADV or

RM794.5 million in 2020. There was also strong retail participation in the newer fundraising avenues – namely equity crowdfunding (ECF) and peer-to-peer lending (P2P). Funds raised through ECF rose from RM32.74 million in 2017 to RM127.73 million in 2020 – whereby 60% of the investors are retail and more than 40% of the investors are below 35 years old. The same trend is also seen in the P2P market whereby funds raised rose from RM37.15 million in 2017 to RM503.31 million in 2020 – whereby about 90% of the investors are retail and more than 60% of the investors are below 35 years old.

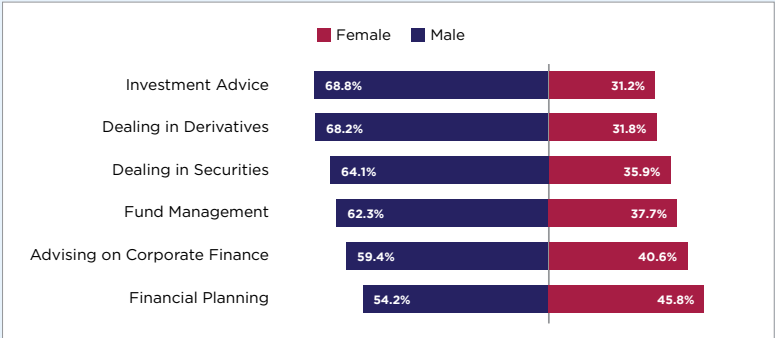
**4. Lack of gender diversity amongst licensed holders**

Within the licensed personnel, data shows it is male-dominated over the last 5 years and the highest % of males is in investment advice and dealing in derivatives.

**Figure 14 :**  
**Gender Composition (as % of Total Licensed Holders) by Year**



**Figure 15 :**  
**Gender Composition of Licensed Holders By Core Activity in 2019**



Source: SC data on licensed capital market intermediaries 2015 - 2019, ICMR calculations, 2021

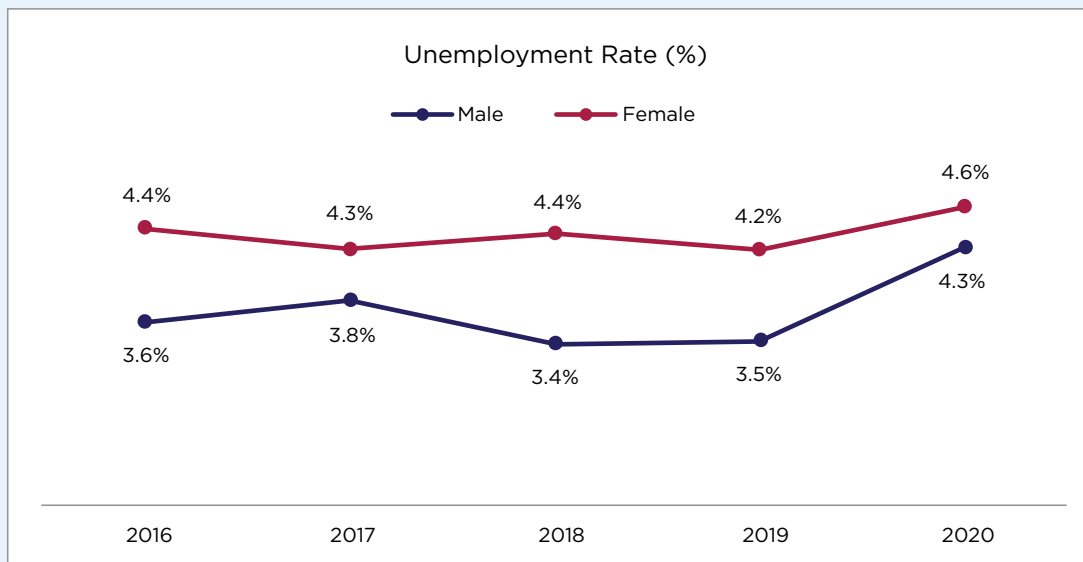
Gender inequality is a major problem which Malaysia has yet to effectively tackle. According to the World Economic Forum (WEF) Global Gender Gap Index (GGGI) for 2021, Malaysia ranks 104<sup>th</sup> out of 156 countries in terms of economic participation and opportunity (index score of 0.638), lowest among all the other ASEAN countries.<sup>31</sup>

The economic benefits of increasing participation of females in the workforce has been widely published. By increasing the number of females in the workforce, countries can allocate labour efficiently, and this in turn

provides an increase in productivity. In nations where the gender gap has been narrowing over time, the contribution to growth from improved efficiency was apparent.<sup>32</sup>

Since 2016, the number of female graduates have surpassed the number of male graduates by an average of 10% each year. Despite this, from 2016 to 2020, as shown in Figure 16, the unemployment rates for female graduates have consistently been higher compared to male graduates. In 2020, the unemployment rate for female graduates was at 4.6% compared to male graduates at 4.3%.

**Figure 16 :**  
**Unemployment rates between male and female graduates 2016 - 2020**



Source: Department of Statistics Malaysia (DOSM)

For the capital market sector to become a more strategic sector, its market participants and businesses will also need to explore how to leverage the underutilised female talent pool to become capital market licensed participants.

Given the way Covid-19 is transforming the ways of working, more flexible working modalities would need to be considered to allow for a greater female talent pool to contribute toward the sector's growth.

31 World Economic Forum. (2021). *Global Gender Gap Report*.

32 International Monetary Fund. (2018). *Economic Gains from Gender Inclusion: Even Greater than You Thought*.

# Key insights from focus group sessions with CEOs and HR

As part of ICMR's research process, we also conducted a series of in-depth interviews with CEOs and HR personnel across the licensed activities to identify key challenges faced by the industry.

A high-level summary of responses during the interviews provides a useful preview of challenges faced by the industry, which coupled with the data from the SC, was also used as a basis to develop the industry-wide survey.

Across all focus groups and interviews, industry participants expressed concerns on:

## 1. Lack of talent pipeline within the industry

The participants suggested that there was a need to work with the Ministry of Education and universities to promote capital markets as a viable career path for the youth. Some suggestions put forth included:

- Consider semi-structured internship programmes in the final years of study with attachment to industry / regulators.
- Reciprocal relationship whereby universities are able to identify gaps in the curriculum and infuse more practical aspects into curriculum, and industry to harness new talent.
- Programmes to be coordinated at an industry level to leverage economies of scale as all players have a vested interest in the talent pipeline.
- Develop a pool of industry participants to provide training to university students.

The participants also felt that there was a need to explore mid-career transition professionals from different industries who can be fast-tracked from a training and development perspective while some also suggested the need to reassess tax and incentives to attract the right quality talent.

## 2. Need to create a value proposition to attract the millennials

The participants felt that there was a need to engage with the workforce of the future to determine what they want. In line with this, it was raised that millennials have strong digital capabilities and hence Malaysia should consider positioning itself as a hub for middle-to-back office operations to take advantage of the move that many companies are making towards outsourcing as well as automating these functions.

## 3. The industry suffers from attrition and staff pinching

The participants highlighted that as mid-size firms go on a hybrid model that sees the employees doing the full suite of activities within the company - as these companies could not afford to build talent specialists - these recruits then become highly poachable especially once they are licensed. Participants felt that attrition is seen throughout all capital market activities and that there is a need to explore introduction of rules or fines for pinching, especially for those who are licensed. The proceeds of the fines could go to a training and development fund (similar to BNM's Staff Training Fund).

## 4. Quality of training programmes need to be enhanced and the mode of delivery needs to be refreshed in line with the changing landscape

Participants felt that there is a need to enhance training programmes to meet the changing needs. In line with this, it was also raised that there is a need to consider various delivery modes for training programmes for example hybrid learning through online-learning, webinars, e-learning etc. complemented with

onsite workshops. Participants also felt that training has to be made more accessible from a cost perspective.

Participants raised the point that soft skills need to be included into the training programmes and that there is a need to emphasise digital skills.

#### **5. Need for greater streamlining of programmes**

Participants felt that given the plethora of programmes available there is a need for greater streamlining across the training ecosystem. Additionally, the need for greater coordination across regulators and industry associations for the purposes of open architecture were also raised. They suggested having industry-wide digitalisation programmes, based on a

customisable model for different levels within the industry.

#### **6. The effectiveness of CPE as a continuous learning tool**

The effectiveness of the current CPE process was questioned by some participants who felt that it is currently too easy to obtain the CPE points. The participants gave feedback that CPE training needs to adopt a more targeted/specialised approach to enable licensed professionals to build on their specific expertise, e.g. derivatives, investment advice in specific areas like property. It was also raised that senior capital market participants should be able to gain their CPE points not only from attending training but by giving training.

Chapter Four

# Industry Survey: Key Findings





In order to get a more strategic perspective on talent in the capital market as well as the effectiveness of the training ecosystem, ICMR conducted a survey which was sent to CEOs of all licensed intermediaries. 80 CEOs accessed the survey and we received 89% response rate. The survey respondents were representative of the various licensed intermediaries within the capital market.

The survey consists of 25 questions covering four key areas:

1. Industry landscape,
2. Current talent within the organisation,
3. Attracting and retaining talent within the organisation, and
4. Quality of training ecosystem.

There were two types of questions in the survey.

- ‘Rate questions’ where CEOs had to give each option a score out of 10. The higher the score the better or more important the item is. When presenting the results, we then used the average score.
- ‘Rank questions’ where CEOs had to choose the top 5 options. These types of questions were used when there was a long list of options available due to the differing market segments that these CEOs were operating in. When presenting the scores, we used weighted average where rank 1 has a higher weightage than rank 5.

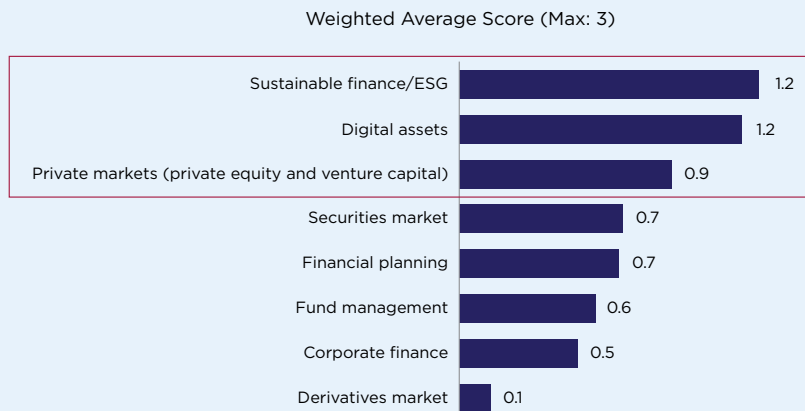
## Industry landscape

In this section, survey questions focused on understanding how CEOs viewed the overall industry landscape in terms of the growth areas and key challenges.

The survey findings showed that CEOs felt that **growth in the next 3 years** would be in these

market segments: Sustainable Finance, Digital Assets and Private Markets. This is in line with global trends as well as ICMR's report "The Evolving Business of Asset Management: Malaysia's Perspective" which highlights that investor preferences are moving towards SRI funds and private mandates.

**Figure 17 :**  
**Growth segments in the next 3 years**

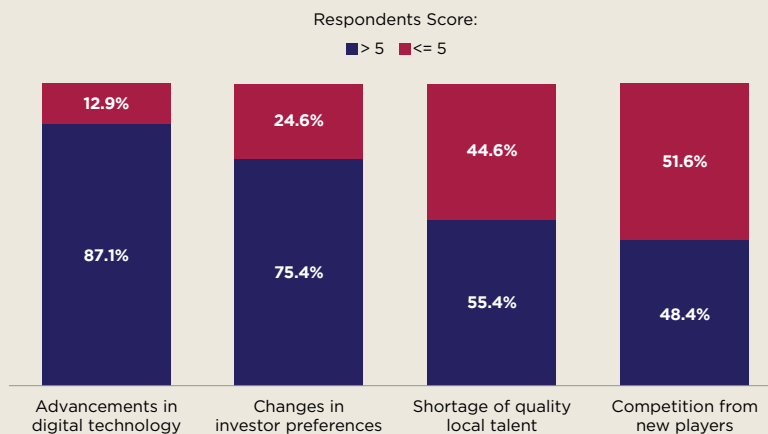


Source: ICMR Survey to licensed financial intermediaries, 2021

With regards to structural factors that would be affecting the industry in the short to medium term, 87% of CEOs highlighted that they expected advancements in digital technology, followed by 75% of CEOs highlighting changes in investor preferences to be key factors affecting the industry.

It is interesting to note that 55% of CEOs felt that **talent shortage would affect the industry, ranking it higher than competition from new players**. In an age of accelerating digital advancements, the skillsets required would be significantly different, hence heightening the existing talent shortage.

**Figure 18 :**  
**Structural factors affecting the industry in the short to medium term**

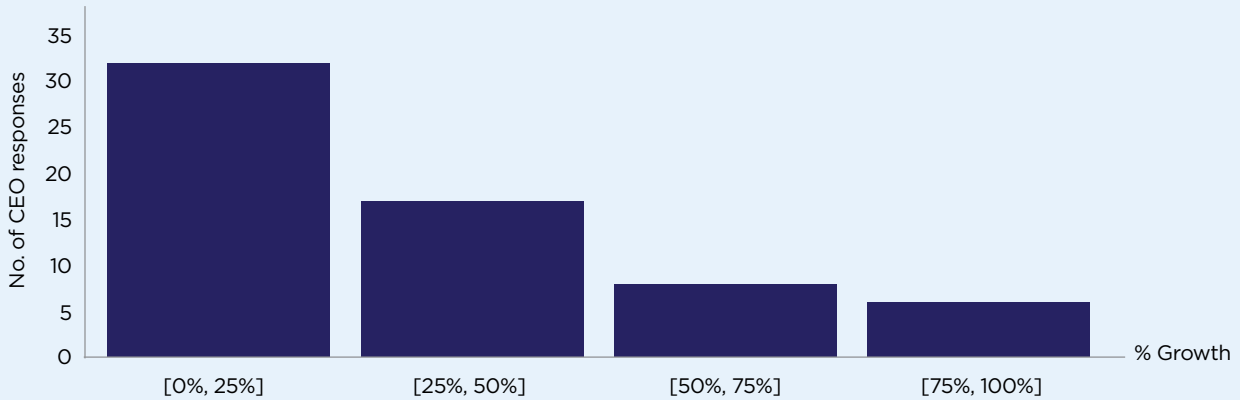


Source: ICMR Survey to licensed financial intermediaries, 2021

While CEOs felt that advancements in digital technology and changes in investor preferences would be the key factors affecting the industry, there was a paucity in the response when asked on the potential growth in their business models driven by new distribution channels for example those which leverage on AI or blockchain technologies. Most

CEOs responded that only 0-25% of growth would be through new distribution channels. It would appear that despite the disruptions faced by the industry due to accelerating pace of technological change, many intermediaries are still adopting a short-term view to a fast-evolving market instead of developing a proactive, strategic response.

**Figure 19 :**  
**Growth via new distribution channels**



Source: ICMR Survey to licensed financial intermediaries, 2021

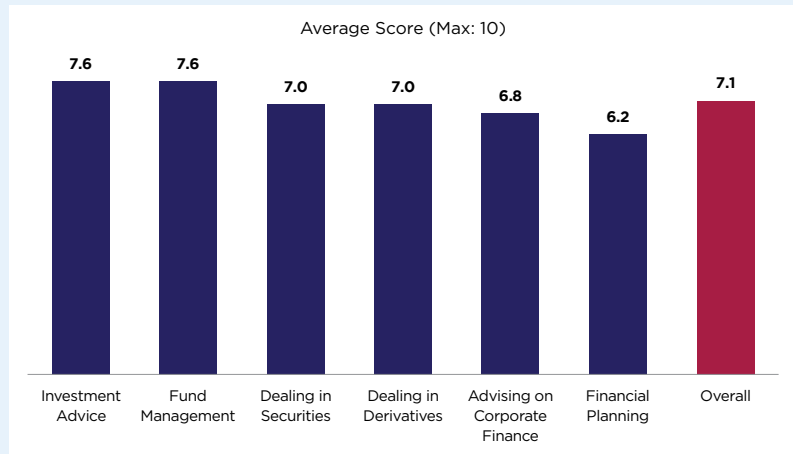
## Current talent in the industry

The survey then focused on how CEOs perceived the quality of their current workforce and the areas where they feel that skills gaps exist.

Overall, when asked to rate/rank their view of the quality of their current workforce, the CEOs rated their **current level of talent at a 7.1/10**.

Broken down by different regulatory activities, the CEOs in the investment advice and fund management space rated their current talent higher at 7.6. However, CEOs in the financial planning industry viewed their current talent level was only at 6.2/10.

**Figure 20 :**  
**Current quality of talent in the organisation**



Source: ICMR Survey to licensed financial intermediaries, 2021

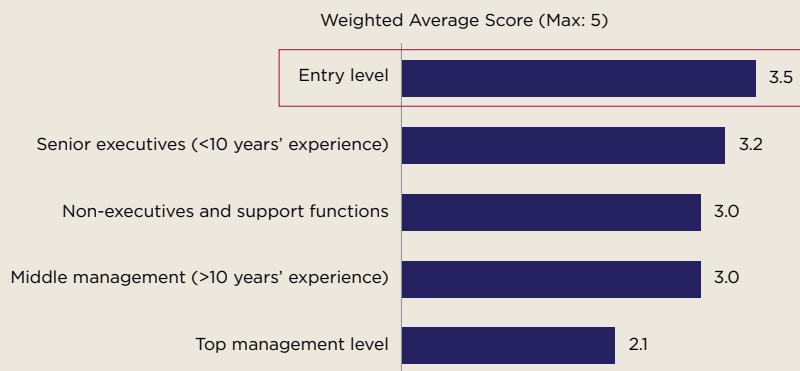
In terms of where the largest **skills gaps** exist, CEOs were asked based on:

### 1. Level in organisation:

CEOs were required to rank various levels of

staff based on seniority within the organisation. CEOs felt that the largest skill gap was in the entry level (3.5/5) while the lowest was at top management (2.1/5).

**Figure 21 :**  
**Largest skills gaps by level in the organisation**



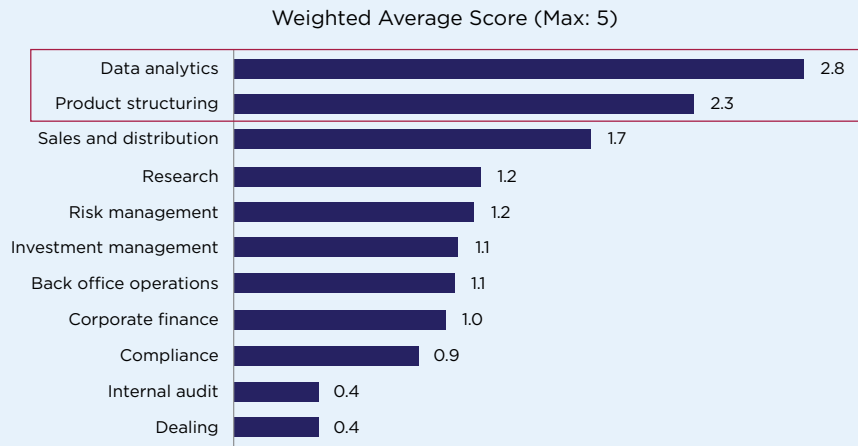
Source: ICMR Survey to licensed financial intermediaries, 2021

**2. By functions:**

When CEOs were asked to rank the top 5 functions that had the largest skill gaps, CEOs identified data analytics (2.8/5) and product structuring (2.3/5) while the lowest skill gaps were identified in internal audit (0.4/5) and dealing (0.4/5).

structuring (2.3/5) while the lowest skill gaps were identified in internal audit (0.4/5) and dealing (0.4/5).

**Figure 22 :**  
**Largest skills gaps by function**



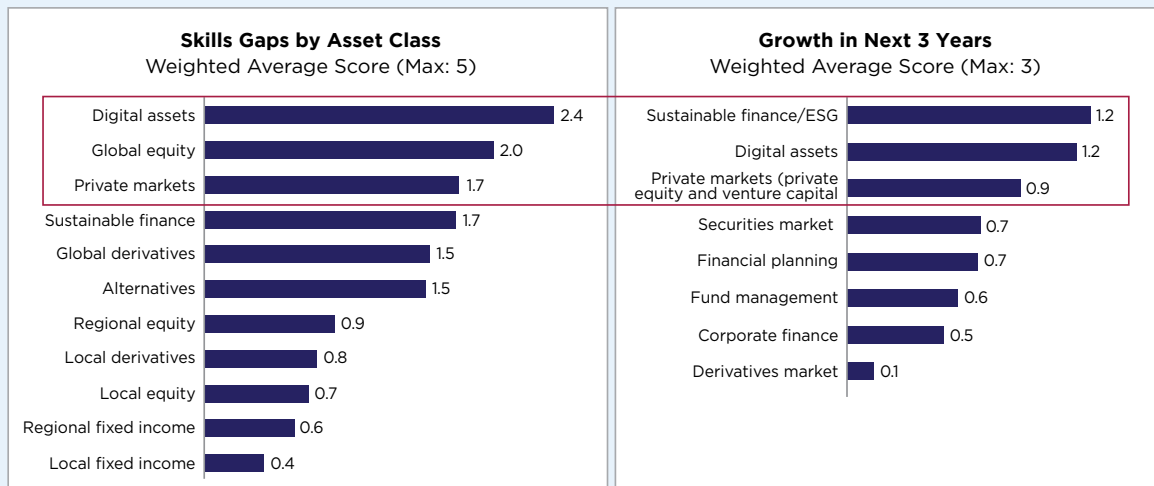
Source: ICMR Survey to licensed financial intermediaries, 2021

**3. By asset class:**

When CEOs were asked to rank the top 5 asset classes that had the largest skill gaps, they highlighted digital assets (2.4/5), global equity (2.0/5) and private markets and sustainable finance (both at 1.7/5).

It is interesting to note that the survey results also highlighted that **the 3 areas that CEOs identified as having highest growth potential** – sustainable finance, digital assets and private markets – **are also the 3 areas where skill gaps are prevalent.**

**Figure 23 :**  
**Largest skills gaps by asset class and growth segments in the next 3 years**



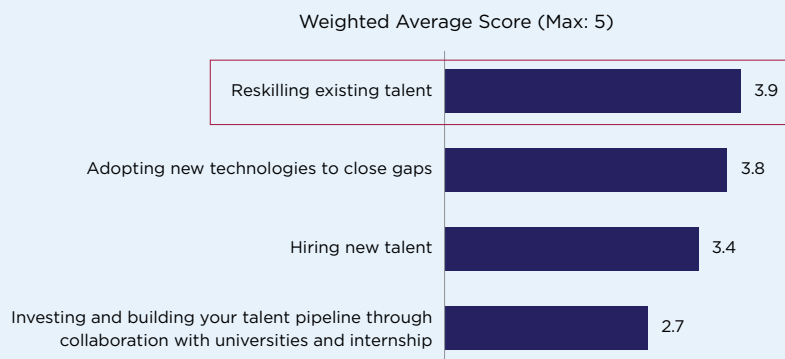
Source: ICMR Survey to licensed financial intermediaries, 2021

This dichotomy between growth areas and skills gaps was also prevalent when ICMR conducted a survey in 2019 amongst asset managers as captured in our report “The Evolving Business of Asset Management: Malaysia’s Perspective.” As such these skills gaps will need to be addressed

in order for the industry to capture its growth potential.

The survey then focused on understanding CEOs’ strategies to address the talent gaps. The results showed that most CEOs are choosing to **reskill their existing talent or adopt new technologies.**

**Figure 24 :**  
**Strategies to close skills gaps in the organisation**

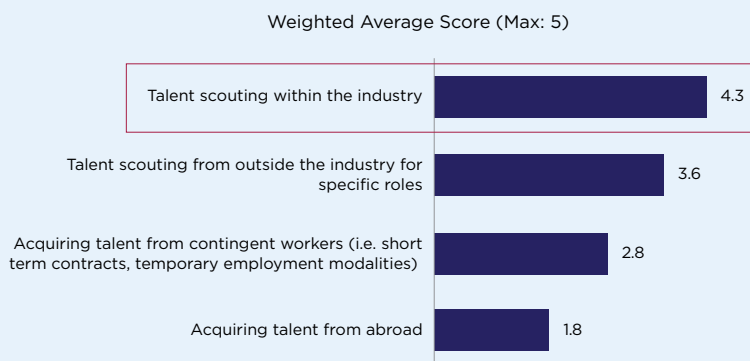


Source: ICMR Survey to licensed financial intermediaries, 2021

The survey then delved into understanding CEOs’ strategies with regards to non-specialist roles as they would have greater flexibility in terms of hiring strategies as these roles do not require the person to hold a capital market license.

Nonetheless, the survey results indicated that **to fill these non-licensed roles, CEOs indicated that they would rather scout within the industry.**

**Figure 25 :**  
**Hiring strategies for non-licensed roles**



Source: ICMR Survey to licensed financial intermediaries, 2021

Despite increased competition to attract talent in the face of changing skillsets, CEOs still prefer to adopt the short-term “tried and tested strategies” to plug talent gaps even for non-licensed roles or non-specialised roles, where there is greater

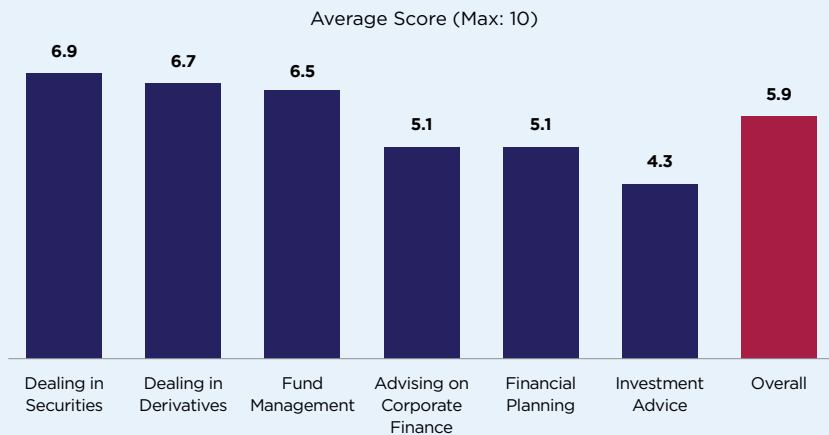
flexibility in hiring. This inertia and the absence of a more inclusive and sustainable long-term hiring strategy amongst industry participants may narrow industry growth in the future.

## Attracting and retaining the younger generation

During our focus group discussions, the challenge of attracting and retaining the younger generation was highlighted and hence in our survey we posed specific questions with regards to the quality of talent coming into the organisation to assess if there was a gap between industry needs and the skill sets of graduates.

**Overall, CEOs scored the quality of new talent as 5.9/10** (lower than current talent score of 7.1/10). Respondents from the segment of Dealing in Securities rated their young talent the highest with an average score of 6.9/10 followed by the Dealing in Derivatives segment scoring 6.7/10.

**Figure 26 :**  
**Quality of fresh graduates hired into the organisation**

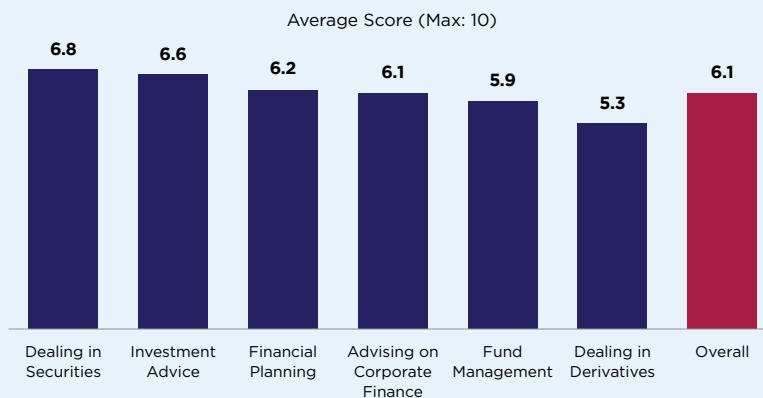


Source: ICMR Survey to licensed financial intermediaries, 2021

In terms of **attracting young talent into their organisations, CEOs rated their experience at only 6.1/10**. Respondents from the Dealing in Securities segment had the best experience in attracting the younger generation (6.8/10), while respondents

from the Dealing in Derivatives segment gave the lowest score for their experience in attracting the new generation. (5.3/10). This reflects lack of pipeline in some segments of the capital market.

**Figure 27 :**  
**Quality of experience in attracting young talent into the organisation**



Source: ICMR Survey to licensed financial intermediaries, 2021

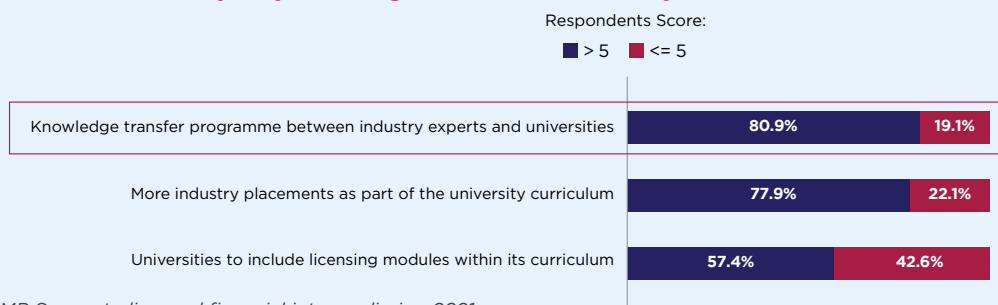
The survey then asked CEOs on the ways that they feel the quality of new talent could be improved.

**81% of the respondents rated knowledge transfer programs** to be a viable solution to enhance the quality of fresh graduates for this industry while 77% highlighted the need to include more industry placements as part of the university curriculum. This would suggest that CEOs feel that in order to better prepare the next generation of workforce to meet industry specific needs, stronger links between industry and universities need to be established. This also indicates that students require hands-on practical industry experience to be embedded during the course of their studies.

ICMR’s qualitative interviews also indicated the need to ensure that the university curriculums include more practical aspects in order to better

match industry needs and increase graduate’s employability. This mismatch between the university graduate skillsets and industry-readiness had been highlighted in the past and in line with this, SIDC has taken proactive measures by working with some universities to include parts of the SC licensing examination into their university curriculum. However, based on our focus dialogue sessions, some participants viewed introducing SCLE into the university curriculum as too restrictive on a student’s flexibility to change their career trajectory in the future at such an early stage. In addition, based on the survey, 57% of CEOs had suggested including SCLE into university curriculum in order to improve quality of new talent, while our qualitative interviews indicated further need to ensure that the university curriculums include more practical aspects of training in order to better match industry needs and increase graduates’ employability.

**Figure 28 :**  
**Strategies to enhance the quality of fresh graduates in the industry**

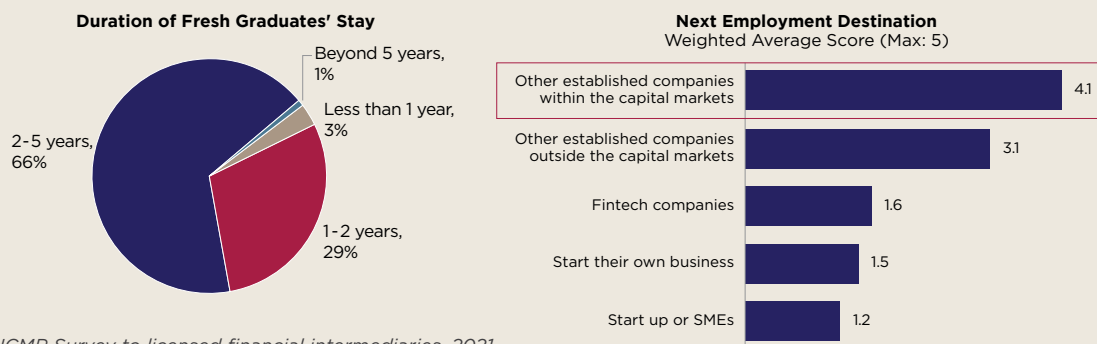


Source: ICMR Survey to licensed financial intermediaries, 2021

In terms of **retaining talent**, two-thirds of the respondents estimated that fresh graduates would stay between 2-5 years in the organisation and that most would leave to join other established companies within the capital markets.

The data validates the points raised in the dialogue sessions with regards to staff pinching and in a tight labour market this is akin to “musical chairs” being played in the finance industry.

**Figure 29 :**  
**Duration that fresh graduates stay in the organisation and their next employment destination**



Source: ICMR Survey to licensed financial intermediaries, 2021

## Quality of the training ecosystem

This part of the survey focuses on how CEOs perceive the overall training ecosystem from a strategic perspective.

When the CEOs were asked to rate the **importance of learning and development** in the organisation, **97% of CEOs across the market segments rated the question above 5.**

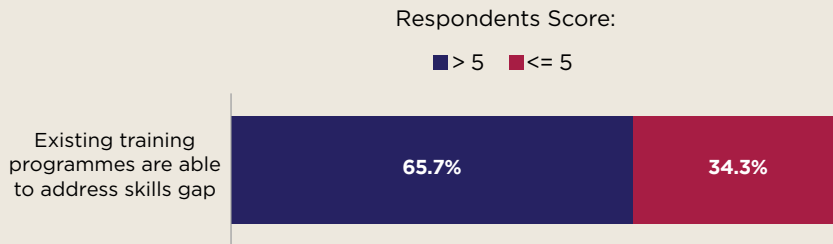
**Figure 30 :**  
**Importance of learning and development**



Source: ICMR Survey to licensed financial intermediaries, 2021

However, when they were then asked if the existing training programmes could address the skills gaps, 66% of the respondents gave a response above 5.

**Figure 31 :**  
**Ability of existing training programmes to address skills gaps**

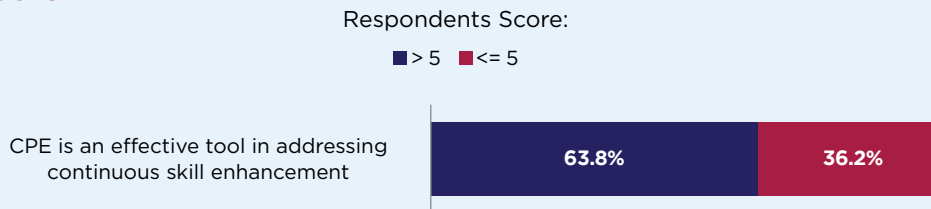


Source: ICMR Survey to licensed financial intermediaries, 2021

CEOs were then asked their views on the various learning and development tools available.

With regards to CPE as a tool for continuous skill enhancement, 64% of the respondents felt that CPE was effective.

**Figure 32 :**  
**Effectiveness of CPE**



Source: ICMR Survey to licensed financial intermediaries, 2021

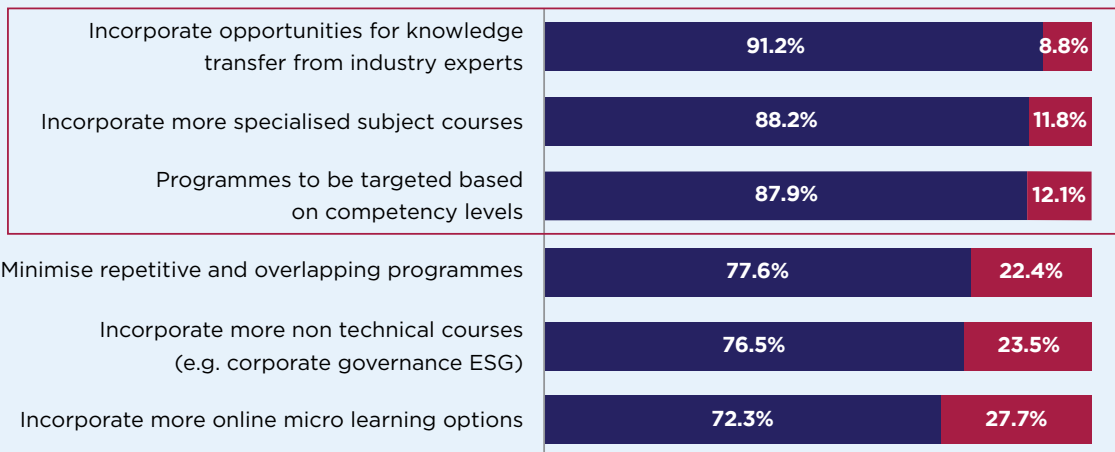
In order to improve CPE, 91.2% of the respondents rated knowledge transfer from industry experts as the most effective method to improve CPE,

followed by including more specialised subject courses and programmes to be targeted based on competency level.

**Figure 33 :**  
**Methods for improvement of CPE**

Respondents Score:

■ > 5 ■ ≤ 5

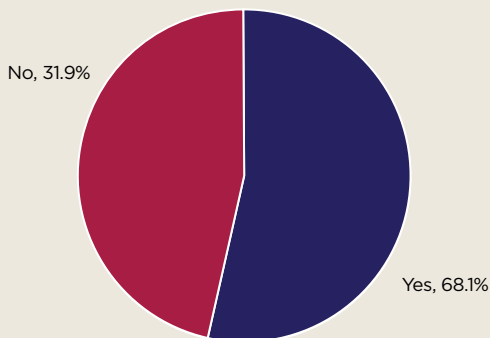


Source: ICMR Survey to licensed financial intermediaries, 2021

With regards to the **Industry Competency Framework (ICF)** which maps out the types of skills required for each licensed activity, **68% of CEOs are aware of ICF** and ranked its **effectiveness at 5.9/10 on average**.

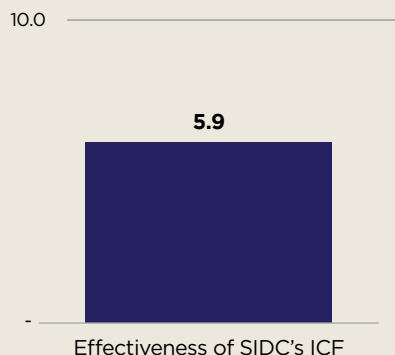
**Figure 34 :**  
**Views on ICF**

**ICF Awareness**



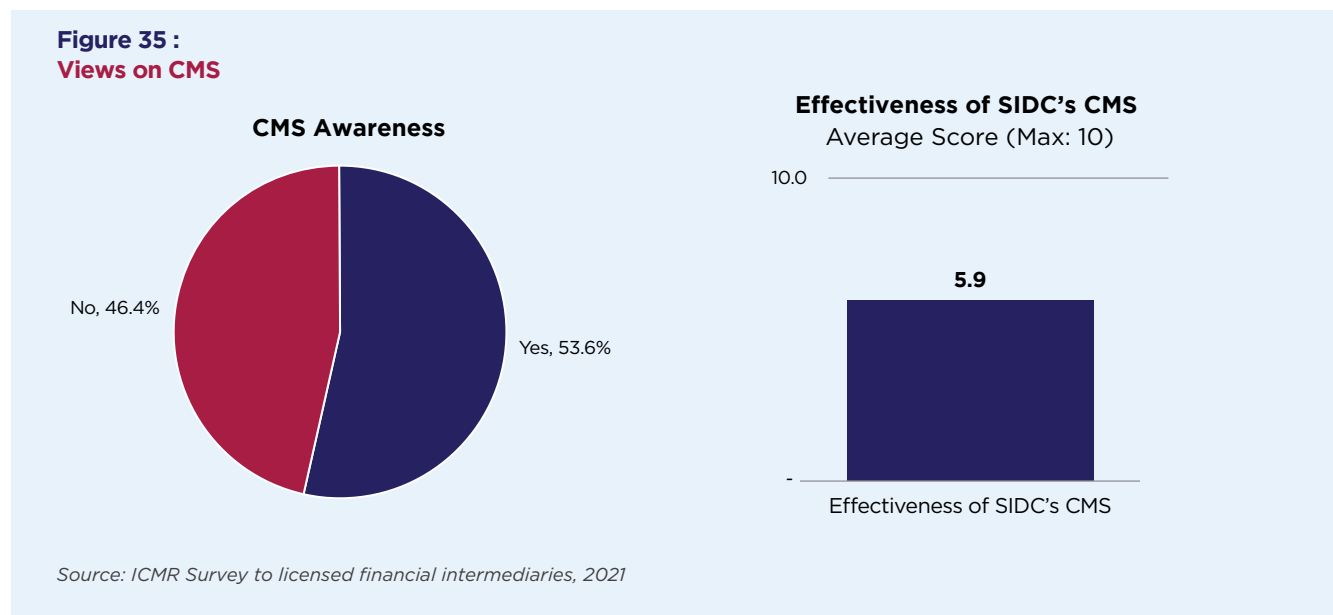
**Effectiveness of SIDC's ICF**

Average Score (Max: 10)



Source: ICMR Survey to licensed financial intermediaries, 2021

With regards to the **Competency Management System (CMS)** which identifies one's competency level for each skill required under ICF, **54% were aware of it and ranked its effectiveness as 5.9/10 on average.**



This indicates that more awareness could be generated towards the competency tools available in line with the CEO's preference for the CPE to be competency-based.

Chapter Five

# Strategic Objectives and Recommendations





Following the key issues identified from the global trends, Malaysia's state of play, coupled with the survey findings and industry engagements, this report provides a set of recommendations to address underlying structural issues that cut across broad industry concerns.

These recommendations are designed to be considered in a holistic manner by policymakers, agencies tasked with training and development initiatives and by the industry players.

In line with this, the recommendations have been formulated with the overarching aim of strengthening the talent value chain within the capital market to achieve these three strategic outcomes:

## 1. Upscale upskilling and reskilling efforts

The advent of new technologies and the impact of Covid-19 will affect industry sectors and businesses to varying degrees, depending on their level of preparedness. The financial sector is no exception

as existing and future technologies will be key influencers of the new financial landscape. Thus, augmenting workforce skillsets to complement these emerging technologies in a way that enhances productivity levels will be imperative.

In line with this, CEOs had indicated that upskilling and reskilling are critical to address the impact of Covid-19. Hence short-to-medium term programmes need to be considered by the financial and capital market policymakers to mitigate the impact of displaced workers as much as possible. Also while these programmes are designed for implementation in the short-to-medium term perspective to respond to the impact of Covid-19, there is an option for a "step-up" or phased-in approach for greater scale and reach in the longer-term.

The overall landscape of work is changing quickly and significantly, and upskilling is critical to prepare the workforce to be future-ready. Data from the SC also showed that digitalisation will affect employees in some market segments more severely than others and hence it is imperative that reskilling programmes are instituted.

## 2. Enhance talent pipeline

Global studies have shown that there will be a severe shortage of talent in the future driven by the mismatch between technological advances including automation, AI, machine learning, and the skills and experience that workers need to leverage these technological tools. The combination of global growth, demographic trends, under-skilled workforces and tightening immigration are driving this global talent crunch and it should be noted that 'financial and business services' was identified as the sector most threatened by severe talent shortages.<sup>33</sup> As learning and development takes centre stage, and the talent pool shortage intensifies competition for talent, there will be a need for greater reliance on homegrown talent.

<sup>33</sup> In Korn Ferry's report "Future of Work: The Global Talent Crunch", the study finds that by 2030, there will be a global human talent shortage of more than 85 million people and could result in about USD8.5 trillion in unrealised annual revenues.



### 3. Strengthen training ecosystem

In the face of critical talent shortage, a key priority for the government and the relevant policymakers is to invest in improving the skills of the existing and emerging talent in order to avert further “brain drain” out of Malaysia and companies relocating their headquarters and operational centres to countries with more plentiful skilled talent.

Additionally, the culture of learning and development to prepare for the future of work needs to be enforced at the organisation-level where companies need to encourage training, development and upskilling within their workforce. Reskilling and upskilling are becoming increasingly important in a fast-paced world where information is at our fingertips and the environment is constantly changing. Thus, the quality of Malaysia’s training ecosystem needs to be enhanced to ensure that our local talent is able to keep pace with the demanded skillsets.

The ICMR survey showed that 97% of CEOs felt that learning and development in the organisation was important. However only 66% of them felt that the current training programmes met their needs and only 64% of CEOs felt that the current CPE was effective.

Thus, the overall training value chain needs to be reviewed to enhance and promote the culture of consistent reskilling and upskilling. In line with this, tools such as CPE need to be re-evaluated and training programmes need to be reconfigured in line with changing needs.

To achieve these outcomes, we propose six recommendations. All of these recommendations should be viewed in a holistic manner. The recommendations are interlinked and the development of a cohesive talent ecosystem for the future of the capital markets requires a multidimensional, multi-stakeholder approach.

To address this, CEOs and business leaders need to create a conducive culture to attract and retain talent while capital market policies with regards to attracting foreign players to complement local talent must be reviewed.

Data from SC shows that with regards to licensed personnel in the capital market, there is an aging population and that female participation is lacking. In order to grow the talent pool, there is a need to leverage all segments of the labour market. Due to this, it is crucial for industry, academia, training providers and policy makers to collaborate and share resources to help develop talent for the industry.

As new generations enter the labour market and given the existing talent shortages, it is crucial to understand how best to facilitate this transition in the most effective manner. Introducing capital markets as a career option for students whilst they are at university-level could encourage more participation in the sector. However, this must be done in conjunction with organisations creating a conducive work culture, as this would determine the length of time that talent stays in an organisation. There is also a need to increase female participation in the capital markets. This will not only promote equality between genders, which is important for overall macroeconomic development, but also provide diversity in views, which could make for better business decisions.

## Recommendation 1

### Capital market reskilling programmes to address impact of COVID-19

To help prepare low-mid-skilled employees in financial institutions to face the impact of Covid-19, the rise of automation due to digitalisation and the various demographics that are most likely to be affected by automation, a training and reskilling programme could offer a subsidy or cash incentive (and for those still employed, through a co-funding structure with employers) to the individuals who are able to complete a full certification or qualifications in selected CPE-approved courses that are identified as “future skillsets” needed in the financial sector.

This initiative could be undertaken by Securities Industry Development Corporation (SIDC). SIDC has already identified the key skills needed in the financial industry through the Industry Competency Framework (ICF) that comprises 58 competency titles, including digital technology application, aimed at covering 105 job roles in the Malaysian capital market. SIDC currently provides innovation-centric introduction level webinars such as “Big Data 101” and “Cryptocurrency 101” which could

be offered free of charge or at subsidised rates to encourage low to mid-skilled employees from multiple sectors to enter the financial sector.

This would be similar to the Monetary Authority of Singapore (MAS)’ Training Allowance Grant to encourage financial institutions and FinTech firms to make use of the downtime in business activity to upgrade skillsets.

At a national-level, the government could also consider the launch of a fintech-enabled national-scale training subsidy programme, leveraging on e-wallets and education platforms to distribute subsidies for the purpose of re-skilling. A similar initiative has been launched in Jakarta in early-April 2020, where a pre-employment card programme is being extended to the unemployed (from pre-employed to those unemployed due to Covid-19) that offers them training courses by various institutions on a single platform to enhance their career mobility with more current skillsets, with training costs borne by the government.

## Recommendation 2

### National-level interdisciplinary talent platform complemented with a 'Skills for Future' fund

Various initiatives are currently being conducted to address talent issues. There is a need for these collective efforts of statutory authorities, government-linked companies and the private sector to be coordinated through the establishment of a national-level interdisciplinary talent infrastructure aimed at harnessing human capital across various industries and professions.

This collective platform can be utilised to address skills gaps, optimise talent allocation and identify talent from interdisciplinary sectors and functions to access a wider talent pool and to address issues such as cross-border flows of talent including leveraging on skilled diaspora.

This platform would create a centralised avenue for jobseekers and workers affected by the Covid-19 situation. This would be similar to Workforce Singapore's 'Adapt and Grow' initiative working to create more avenues for jobseekers and workers affected by the Covid-19 situation.

The platform could be complemented with a **national-level interdisciplinary 'Skills for Future' fund** which offers specific sector-based programmes and must be co-funded by public agencies and private sector in the financial sector to ensure commitment by the companies and to mobilise scale and reach of the reskilling initiatives.

Some comparable initiatives include Future Skills Centre Canada, which is a collaboration between

the government of Canada, the private sector and academia to identify future skills and provide innovative solutions to address the gaps, or the Digital Hub, a public-private partnership under the Danish national Digital Growth Strategy that provides a matchmaking platform to improve companies' access to talent within emerging digital technologies like data and AI.

On 1<sup>st</sup> July 2021, the government launched its **National Fourth Industrial Revolution (4IR) Policy** where one of the four key thrusts is to equip the *rakyat* with 4IR knowledge and skills sets. The policy adopts a collaborative approach between businesses, society and government to deliver on strategies focused on industry-led upskilling and reskilling of the existing workforce, matching the talent pipeline with future needs, equipping the future workforce with 4IR skills, providing equal access to 4IR opportunities across the population and upskilling and reskilling the civil service.

In line with this, the capital market has to embark on a complementary approach. For example, the government has embarked on the **MySTEP programme 2021** where trainings are coupled with short-term placements with GLCs and public sector. Khazanah is partnering with General Assembly to equip individuals with in-demand digital skills.<sup>34</sup> As such, training providers in the capital market could play a role in **bringing these skill sets to the capital market** particularly as the survey identified data analytics as a key skill gap.

<sup>34</sup> Zainal, F. The Star. (2021). *Transforming careers for the digital age*.

## Recommendation 3

### Develop an effective and scalable “university-industry transfer” programme

As global trends have shown that there will be significant talent shortages in terms of skills mismatch across the globe, Malaysia will need to redouble its efforts at building its own talent pipeline into capital markets by leveraging talent coming straight out of institutes of higher learning and universities. While these younger workers can be trained and recruited faster and at a lower cost, one of the major challenges which has been identified is the significant and growing mismatch between university graduate skillsets and the needs of the job market.

The survey showed that CEOs felt that the quality of new talent was rated as 5.9/10 below the level of existing talent at 7.2/10, after taking into account differences in experience levels.

ICMR’s qualitative interviews indicated there was a need to ensure that university curriculum included more practical aspects in order to better match industry needs and increase graduates’ employability. In response to this as well as the mismatch between the university graduate skillsets and industry-readiness, SIDC has taken proactive measures by working with some universities to include parts of the SC licensing examination into their university curriculum. However, based on our focus dialogue sessions, some participants viewed introducing SCLE into the university curriculum as too restrictive on a student’s flexibility to change their career trajectory in the future. In addition, based on the survey, only 57% of CEOs had suggested including SCLE into university curriculum in order to improve quality of new talent.

In response to questions related to effective measures to improve talent in the sector, 81% of CEOs rated “knowledge transfer programs” between industry experts and universities and 78% of CEOs rated “introduce more industry placements into universities” as more effective measures. Hence to better prepare for the next generation of

workforce to meet industry specific needs, stronger links with universities will need to be established.

**In terms of linking university curriculum to the more practical aspects of capital markets without limiting a graduates’ flexibility in terms of career trajectory, further studies will need to be conducted to examine how best to increase the industry-readiness of graduates.**

#### 1. Introducing more structured programmes in universities which enable students to acquire work-relevant skills by partnering with financial institutions during their university years.

Students undergo a structured “on-the-job training” with the financial institutions or **through the ‘technical internship and apprenticeship training’ offered by training providers** to get an early taste of what the industry is like which can help them make more informed career decisions.

#### 2. Introduce a broader set of capital market-related curriculum into universities which are better aligned to the industry’s employer needs.

**This is done by both leveraging existing capital market competency standards and skills framework as well as conducting a detailed study on the impact of automation and data analytics over the next 3-5 years on the financial sector jobs** to move towards a skills-based rather than qualification-based career development.

For example, with greater digitalisation and automation, the capital market careers of the future will not be limited to the specific licensed activities alone thus requiring a transition away from disciplinary specialisation. Careers in the capital market sector will compose of broader and more generalist skillsets covering digital marketing and communications, middle and back-end algorithmic design processes,

design thinking capabilities for innovation and entrepreneurial skillsets. This will be increasingly crucial to capital market functions and business models of the future.

This can also be done by **leveraging existing programmes such as Malaysia's Digital Economy Corporation (MDEC) Digital Tech Facility Expert**, which provides a structured programme to create a pool of digital tech subject matter experts amongst university faculty members. In this manner, we would be able to marry digital and capital market skills.

### **3. This can be complemented by developing a pool of industry participants to provide training to university students as fellows.**

In Japan, senior capital market participants give back through their corporate social responsibility programmes by volunteering to lecture or give talks at universities. Malaysia's Ministry of Higher Education (MOHE) has developed a CEO@Faculty Programme to bring together top local and international CEOs and industry players into Malaysia's universities as "Adjunct Professors." However the awareness of this programme appears to be lacking and there is a need to enhance the coordination between universities and industry through a more structured programme.

This could be complemented through *key university-industry liaisons*. A key university-industry liaison would also be able to assist university students to get industry placements through a fast-track placement programme to help increase the employability of students through an augmented structured programme.

Additionally, in order to facilitate greater interdisciplinary skillsets across different sectors as well as target a more diverse talent base, a specific social innovative programme could be developed. In line with this, a "Grow Our Talent" programme should be considered to increase private sector involvement in societal issues like talent development and retention. This could increase diversity from "new" talent pools through leveraging on talent from different sectors, women on career break who would like to return to the workforce, or the disabled.

**The social innovation programme should be a partnership between government-related agencies, educational institutions, and businesses through a co-investment model between both public and private sector and to combine expertise and teaching infrastructure.** At the same time, companies can play an active role by co-designing the curriculum which brings in their practical experiences to ensure targeted skill development that matches the demands of the business. In addition, as part of this programme, a mentoring and coaching initiative whereby experienced capital market professionals or industry specialists and veterans are appointed as "Fellows" can be offered as part of their continuing professional development, thus facilitating a reciprocal exchange of ideas and knowledge-sharing from the senior more experienced capital market professionals to the "new" talent pool. Despite its social objectives, the programme should adopt an entrepreneurial approach and also focus on the development of soft skills (such as interpersonal, self-efficacy, planning, goal setting and collaboration) in participants, apart from the relevant technical skillsets.

As most capital market intermediaries have small numbers of employees, in order for any "university-industry transfer programmes" to benefit from **economies of scale**, it would be best for a third party to develop and run this knowledge transfer programme with industry players as participants.

However, before rolling out a large-scale programme, it is recommended **that a pilot programme be conducted to study the components and design of an effective "university-industry transfer programme" between SIDC, industry and universities.** The pilot programme should cover both the demand and supply side of the employment market, involve various partners across the value-chain and utilise a combination of tools. In line with this, **ICMR could work with SIDC to co-develop a pilot programme for an effective "university-industry transfer programme"**. The pilot programme will be designed through small scale research experiments to identify the most effective methods of "university-industry transfer programmes" and to allow for meaningful insights to be drawn prior to institutionalising a larger scale and costlier programme.

## Recommendation 4

# Promote greater international labour mobility and facilitate cross border partnerships to attract and retain talent to complement home-grown talent

Given the smaller domestic talent pool and Malaysia's central challenge of the "brain drain" of highly-skilled workers, promoting greater international labour mobility and/or the return migration of high-skilled Malaysian workers from overseas, otherwise known as "brain circulation"<sup>35</sup> would bring considerable economic benefits to the country and sector. Facilitating greater labour mobility may also be needed given that the domestic capital market players are already experiencing skilled-talent shortages and thus are set to face greater talent gaps in the next decade.<sup>36</sup> Despite the potential for higher degrees of technological automation in the capital market sector, technology will not be able to fulfil the promised productivity gains if there is insufficient human talent with the right skills to harness these technologies. In addition, as a knowledge-intensive sector, the right skillsets are critical to further develop the capital market for the sector to be able to serve the growing demand for more complex and diverse strategies from the institutions and sophisticated investors.

In Japan, Tokyo Metropolitan Government is making efforts to boost the financial sector in Tokyo by taking measures such as providing incentives for foreign financial firms to enter the market, and with public entities providing seed money under the Emerging Managers' Programme to attract new asset managers. A similar programme was conducted in Malaysia when the Special Scheme was announced in 2005 to allow foreign fund management companies and foreign brokers into Malaysia as part

of a plan to broaden international participation in the capital market. At that time, EPF had provided an initial RM1 billion of investments to these foreign asset managers. Part of the initial value proposition of allowing foreign players to be brought in was the idea that they will transfer and trickle down their knowledge to the domestic market, thus facilitating the positive externalities from the much-needed knowledge transfer. Given the existing critical talent shortages, and after more than 15 years since the introduction of the Special Scheme, it is evident that **there needs to be a reassessment of the Special Scheme's effectiveness in terms of talent development and employment for the capital market's capacity-building objectives.**

**Further studies should be carried out to investigate the feasibility of introducing a restructuring of a similar-type "talent incentive programme" but with more flexible arrangements with regard to talent mobility in the context of the economic and social transitions due to the Covid-19 pandemic. The pandemic has shifted the playing field for talent significantly.**

Hence the term "labour mobility" needs rethinking. The impact and implications of the Covid-19 crisis have certainly made a review and reassessment of the country's labour mobility policies even more necessary and urgent as the pandemic has demonstrated that traditional physical mobility will likely decline in the immediate future, even if unlikely to cease completely. Communication tools make virtual cooperation more user-friendly and

<sup>35</sup> Return migrants come back with physical and human capital earned abroad (Dustmann and Kirchkamp 2002 and Mesnard 2004) may transfer skills and knowledge gained abroad

<sup>36</sup> ICMR. (2019). *The Evolving Business of Asset Management*.

have become an everyday practice during this pandemic. In terms of training, hybrid or blended study programmes and micro-credentials will allow for more flexibility. Thus, instead of having a physical concentration of resources embark on traditional 1 to 3 year postings, we would need to consider having an increase in virtual assignments which taps into a diverse and expanded global talent pool.

Strategic deployments can allow for these virtual assignments to be balanced with the need to only be physically present on occasion via extended business trips or even short-term assignments. Facilitating the coordination of a multi-disciplinary team of experts promotes diversity of thought and a global mindset as well as benefits of knowledge-transfer with local talent.

Post-Covid-19, a new reality will likely emerge on global talent mobility programmes which allow more remote working capacities and flexible working arrangements whereby the term “flexibility” is dependent on the job or project-based work rather than a person’s circumstances. The term “labour mobility” can potentially also include commuter assignments, rotators, extended business trips, contracting and other short-term options.

In addition, the data on capital market players indicate that in Malaysia, the fund management industry and those dealing in securities have a sizeable portion of their employees handling middle to back-office functions. Given Malaysia’s strength in this area, **Malaysia could position itself as the digital “middle-back-office” regional processing hub.** Additionally, as the Fintech sector in Malaysia grows and becomes more internationally competitive, a digital “middle-back-office” hub will need to incorporate automation technologies such as Digital Process Automation (DPA) and Robotic Process Automation (RPA).

### **Incentives should be tailored to attract foreign clients to outsource these functions to Malaysia.**

Also, with economies of scale, greater digitalisation of some of these functions can be explored and this revamp could attract the younger generation who are well versed in data analytics and more sophisticated technological applications. As capital markets are expected to move up the value chain to become a priority sector, more innovative talent strategies are needed. Instead of expecting diverse foreign talent to relocate to Malaysia, a digital “middle-to-back-office” hub allows a wider talent pool from the global markets to be deployed virtually to the hub.

Rather than act as a substitute, the highly skilled global talent complements the Malaysian talent pool which can have positive spill-over effects and exponential benefits as they interact and collaborate with each other. Their addition into the workforce enhances existing skills standards, raises productivity levels, and brings in new knowledge and expertise that may not be readily available domestically.

In addition, leveraging cross-border partnership structures will further augment the knowledge transfer component which is critical for building human capital. Capital market intermediaries should also look into leveraging existing regulatory frameworks that provide for cross-border flexibilities. The ASEAN Capital Markets Forum (ACMF) has also recently launched a **Professional Mobility Framework** to facilitate cross-border movement of investment advisers with fast-track registration and approval from the “host regulator” with the “ACMF Pass” for permitted activities and no additional licensing requirements. Currently, Malaysia, the Philippines, Singapore and Thailand have participated in this programme effective January 2019.<sup>37</sup>

---

37 ASEAN Capital Markets Forum (ACMF). *Initiatives: Professional Mobility*.

## Recommendation 5

### Establishment of a holistic and co-ordinated training and development system

Global trends have shown that the reality of a multigenerational workforce will require companies to leverage the strengths of different generations. In line with this, companies also need to incorporate the future of work agenda including focusing on skill enhancement, values, well-being and human-centred leadership. **This requires a review of the overall training value chain to enhance and promote the culture of consistent reskilling and upskilling.**

The Continuing Professional Education (CPE) is critical to ensure that capital market talent keeps abreast with the latest developments and that they are continually enhancing their skill sets. The survey findings showed that 61% of the respondents viewed the current CPE structure as an effective tool in addressing continuous skill enhancement.

In order to improve CPE, CEOs suggested there was a need for knowledge transfer from industry experts. With regards to **knowledge transfer from industry experts**, during our pilot survey sessions, it was raised that **senior capital market participants should be able to gain their CPE points not only from attending training but by giving training.** It should be noted that the Guidelines on CPE have been revised to specifically recognise the needs of different tiers of capital market licensed holders based on their years of experience. The Guidelines have also allowed for the awarding of CPE points for speaking activities. However, it is apparent that there is a lack of awareness of these revisions and flexibilities amongst capital market licensed holders. Better communication on guideline revisions is required

between policy makers and the industry to facilitate the building a pool of industry experts.

**CEOs also indicated the need for programmes to be targeted based on competency level.** The survey findings showed that 68% of CEOs are aware of the Industry Competency Framework (ICF) which maps out the types of skills required for each licensed activity and 55% of CEOs are aware of CMS which measures one's competency level based on the skills required. **There is a need to develop a comprehensive roadmap to move towards a holistic training system whereby ICF and CMS are integrated as tools and a guide to assess talent levels with appropriate incentive structures to propel the licensed person to take the appropriate CPE courses - which have been identified by the CMS based on his competency level and gaps.**

Singapore's MySkills Portfolio is a free online resource that individuals can use to plan and manage their learning. It encourages individual directed learning and development as the portal allows you to register for exams administered by the Institute of Banking and Finance (IBF), set training goals, track training progress and receive programme recommendations based on training goals. It also allows the financial institution that the individual is attached with to monitor progress for the purposes of funding claims and competency reporting to relevant institutions. This integration allows individuals to set training goals in an industry that is going through consistent transformations. Individuals are provided with the competencies they would need to improve on and they are given opportunities for self-directed learning.

Given the various permutations and complexities, it is timely for **SC, SIDC, other relevant training organisations and industry participants to further enhance the CPE** structure and content.

In line with this, there is also a need to enhance the role of institutional agencies, in **raising standards and quality of professional learning and development, heightening ethical and professional standards and to ensure greater coordination across the financial market ecosystem to allow for streamlining and reduction of unnecessary overlaps of training offerings according to functions in both banking and capital markets.** The

end objective for any training and development programmes should be to enhance the skillsets and increase employability of the licensed professionals which will raise overall standards for the financial ecosystem, as a whole.

As both the ASIAN Institute for Finance and the Financial Services Professional Board have been disbanded, it is timely to **conduct a strategic review** to ascertain how their roles can be subsumed by existing entities. In line with this, there is a **need to ensure the entity is equipped with technical expertise and adequate resources to undertake the enlarged role.**

## Recommendation 6

### Recalibrate training content curriculum to meet long-term changing needs

Aligned with the changing global landscape were the importance of a learning and development culture and the need to reskill and upskill individuals. Local capital market training providers have made progressive developments by continuously updating their modes of delivery. This has since been accelerated during the Covid-19 pandemic, whereby SIDC and other training providers have embraced digital delivery with offerings such as e-learnings, livestreaming events and online webinars and conferences. The price points for webinars and conferences have also been lowered to reflect the change in the mode of delivery. While this has been a positive development in terms of liberating access to training, there is still a need to update and refresh the training content curriculum.

Based on the survey findings, 97% of CEOs highlighted the importance of training and development and 66% of them were satisfied with the programmes currently being offered. CEOs also identified that entry level employees had the biggest skill gap and in terms of job function, the greatest skill gaps are in the areas of data analysis and product structuring. Additionally, CEOs have stated that the three largest areas of growth are:

1. ESG / Sustainable Finance
2. Digital Assets
3. Private markets

However, in terms of asset classes, the greatest skill gaps are in the area of digital assets, global equity, private markets and sustainable finance. It is critical for training providers to address this as the three

areas that have highest growth potential are the same three areas that have the highest skills gap.

Against this backdrop, **training providers will need to conduct a detailed study on the skillsets needs over the next 3-5 years** in the financial market, especially with the impact of automation and digitalisation which are constantly evolving, to identify which jobs are most likely to change significantly.

In tandem, there is a need to **review and redesign the current course content to ensure that the industry can move towards being more skills-based, rather than qualification-based**<sup>38</sup> which facilitates increased hiring from alternate talent pools, greater investments in continuous learning and a move away from hard skills to holistic job skills.<sup>39</sup>

In redesigning its curriculum for future business needs, there is also a greater need to **emphasise on new learning initiatives through engaging with the “real world” through experiential learning activities, promotion of the development of digital skills, soft skills, workforce readiness and entrepreneurship skills**. Findings also show that training programmes need to move away from becoming a tick-box exercise. In the context of financial markets, knowledge has to be absorbed through practical application, combined with simulation exercises and/or with scenario analysis.

Currently for CPE courses that are conducted online, they have to incorporate a pre and post **qualitative element to gauge the knowledge transfer obtained from the course. This is critical to ensure that the depth of understanding and**

<sup>38</sup> World Economic Forum (WEF). (2020). *Why skills - and not degrees - will shape the future of work*.

<sup>39</sup> Field, E., Majumder, S., Pereira, C., & Schaninger, B. McKinsey & Company. (2020). *Hire more for skills, less for industry experience*.

**data obtained can be mined and analysed so as to further enhance the courses available. This requirement for pre and post assessment should be extended to all courses.**

Although the survey findings highlight that in terms of hiring strategies, CEOs said they prefer to scout within the industry compared to outside the industry for even non-licensed roles, taking this approach for all roles will constrain the small talent pool even more. Moreover, this approach is also not aligned with the general trends globally. In LinkedIn's Future of Talent Report 2021 it was highlighted that 64% of companies are now more open to consider hiring from outside their industry, so long as the candidates are able to carry over their skills to match the job requirements. This

provides an opportunity to **bring in fresh talent with new ideas from outside the industry** and it also means employees with highly transferable skills will become more employable across different industries. In recognising the growing importance of interdisciplinary skillsets, Singapore's MAS has also started a Technology in Finance Immersion Programme (TFIP) where mid-career professionals with STEM backgrounds from other sectors are put through structured training programmes in tech areas such as data analytics and cyber security. In this context, **training providers could also play a greater role in facilitating specific "industry-transition reskilling programmes" and offer personalised career advice for those joining the capital market from other occupations and industries.**

# Moving forward

For the Malaysian capital market, the lack of quality talent has been a perennial issue that is highly discussed and debated. This report aims to comprehensively capture the key talent challenges through analysis of data, insights from focus group dialogues with industry participants and key learning authorities, substantiated with results from an industry-wide survey that was conducted this year. The report also proposes several recommendations, which are to be considered by both policymakers, agencies tasked with training and development initiatives and industry players in a holistic manner.

The impact of Covid-19 on talent needs to be addressed through reskilling and upskilling within the capital market and tapping on the wider talent ecosystem to harness the requisite skills. The establishment of a national-level interdisciplinary talent infrastructure aimed at harnessing human capital across various industries and professions will coordinate collective efforts of statutory authorities, government-linked companies and the private sector. This collective platform can be utilised to address skills gaps, optimise talent allocation and identify talent from interdisciplinary sectors and functions to access a wider talent pool and to address issues such as cross-border flows of talent including leveraging on skilled diaspora.

The platform needs to be complemented with a national-level interdisciplinary 'Skills for Future' fund which offers specific sector-based programmes and must be co-funded by public agencies and private sector in the financial sector to ensure commitment by the companies and to mobilise scale and reach of the reskilling initiatives.

As global studies have shown, there will be a severe shortage of talent in the future, driven by the mismatch between technological advances and the skills and experience needed to leverage these technological tools. As the talent pool shortage intensifies competition for talent, there

will be a need for greater reliance on homegrown talent. In line with this, an effective and scalable "university-industry transfer" programme needs to be implemented taking into account that the bulk of capital market intermediaries do not have the economies of scale to do this on their own accord. In this regard, a pilot programme between SIDC, industry and universities will be instituted.

While emphasis will be on growing talent domestically, there is also a need to promote greater international labour mobility and facilitate cross border partnerships to attract and retain talent to complement home-grown talent in specialised areas.

Training institutes and providers must continue to enhance their role in talent development. CEOs of capital market intermediaries have identified that the largest skills gaps are in the areas of sustainable finance, digital assets and private markets- the same market segments that were identified as having the strongest growth potential in the short to medium term. It is therefore paramount that training programmes are recalibrated to address these gaps.

This must be supported by a holistic and coordinated training ecosystem that enhances and promotes a culture of continuous learning and development, which ensures that Malaysian talent keeps pace with the fast-changing landscape.

As Malaysia transitions to a post-pandemic future, the pace of economic recovery hinges on our ability to prepare and position our talent to become the driving force for economic growth. As a small nation of roughly 32 million, there is a need to rethink our current strategies and programmes especially in the context of the post-Covid-19 and the evolving world of work and more importantly we must align our various talent strategies and initiatives to capture this window of opportunity to reform the national talent landscape.



# References

- 2021 Banking and Capital Markets Outlook. (2020). Deloitte Insights. <https://www2.deloitte.com/us/en/insights/industry/financial-services/financial-services-industry-outlooks/banking-industry-outlook.html>
- A Scholarly Investigation of Generational Workforce Differences: Debunking the Myths.* (n.d.). Korn Ferry International. Retrieved September 20, 2021, from <https://www.kornferry.com/insights/this-week-in-leadership/374-a-scholarly-investigation-of-generational-workforce-differences-debunking-the-myths>
- Abelha, M., & Fernandes, S. (2020). *Graduate Employability and Competence Development in Higher Education—A Systematic Literature Review Using PRISMA*. Multidisciplinary Digital Publishing Institute. <https://doi.org/10.3390/su12155900>
- Accenture. (2017). *Compressive Disruption: Learn to thrive under pressure*. [https://www.accenture.com/\\_acnmedia/pdf-61/accenture-compressive-disruption-slideshare.pdf](https://www.accenture.com/_acnmedia/pdf-61/accenture-compressive-disruption-slideshare.pdf)
- ASEAN Capital Markets Forum. (n.d.). ASEAN Capital Markets Forum (ACMF). Retrieved June 30, 2021, from <https://www.theacmf.org/initiatives/professional-mobility/about-professional-mobility>
- Bank Negara Malaysia receives 29 applications for digital bank licences - Bank Negara Malaysia.* (2021, July 2). Bank Negara Malaysia. <https://www.bnm.gov.my/-/bnm-receives-29-applications-for-digital-bank-licences>
- Field, E., Majumder, S., Pereira, C., & Schaninger, B. (2020, December 17). *Hire more for skills, less for industry experience*. McKinsey & Company. <https://www.mckinsey.com/business-functions/organization/our-insights/the-organization-blog/hire-more-for-skills-less-for-industry-experience>
- Going for Growth - OECD.* (2021). OECD. <https://www.oecd.org/economy/going-for-growth/>
- Gomez, K., Mawhinney, T., & Betts, K. (2020). *Welcome to Generation Z*. Deloitte. <https://www2.deloitte.com/content/dam/Deloitte/us/Documents/consumer-business/welcome-to-gen-z.pdf>
- Has Upskilling been Effective in Solving Talent Shortage? | Finance Accreditation Agency (FAA) (1012469-W).* (2020, January 21). Finance Accreditation Agency. <https://www.faa.org.my/article/has-upskilling-been-effective-in-solving-talent-shortage>
- International Labour Organization. (2019, February). *Supporting longer working lives: Multistage approaches for decent and productive work*. [https://www.ilo.org/wcmsp5/groups/public/---dgreports/---cabinet/documents/publication/wcms\\_713371.pdf](https://www.ilo.org/wcmsp5/groups/public/---dgreports/---cabinet/documents/publication/wcms_713371.pdf)
- International Labour Organization. (2020). *Global Employment Trends for Youth 2020: Technology and the future of jobs*. [https://www.ilo.org/wcmsp5/groups/public/---dgreports/---dcomm/--publ/documents/publication/wcms\\_737648.pdf](https://www.ilo.org/wcmsp5/groups/public/---dgreports/---dcomm/--publ/documents/publication/wcms_737648.pdf)
- International Monetary Organization. (2018, November 28). *Economic Gains from Gender Inclusion: Even Greater than You Thought*. IMF Blog. <https://blogs.imf.org/2018/11/28/economic-gains-from-gender-inclusion-even-greater-than-you-thought/>
- ISEAS-Yusof Ishak Institute, Abdur Rahman, A., Farha Jasmin, A., & Schmillen, A. (2020, November). *The Vulnerability of Jobs to COVID-19: The Case of Malaysia*. [https://www.iseas.edu.sg/wp-content/uploads/2020/10/ISEAS\\_EWP\\_2020-09\\_Amanina\\_Alyssa\\_Schmillen.pdf](https://www.iseas.edu.sg/wp-content/uploads/2020/10/ISEAS_EWP_2020-09_Amanina_Alyssa_Schmillen.pdf)

- Jensen, M. B., Johnson, B., Lorenz, E., Lundvall, B. Å., & Lundvall, B. A. (2007). Forms of knowledge and modes of innovation. *The learning economy and the economics of hope*, 155.
- Khazanah Research Institute, Tumin, S. A., Sazali, N. T., & Abdul Hamid, H. (2020). *WORK IN AN EVOLVING MALAYSIA: THE STATE OF HOUSEHOLDS 2020 PART II*. <http://www.krinstitute.org/assets/contentMS/img/template/editor/KRI%20-%20Full%20report-%20Work%20in%20an%20Evolving%20Malaysia%20-%202020201103.pdf>
- Korn Ferry. (2018). *The Global Talent Crunch, Country Perspective: Malaysia*. <https://focus.kornferry.com/wp-content/uploads/2015/02/KF-Talent-Crunch-Country-Report-Malaysia-Digital.pdf>
- Kudyba, S. (2020). COVID-19 and the Acceleration of Digital Transformation and the Future of Work. *Information Systems Management*, 37(4), 284–287. <https://doi.org/10.1080/10580530.2020.1818903>
- OECD. (2019, March). *Preparing for the Changing Nature of Work in the Digital Era*. <https://www.oecd.org/going-digital/changing-nature-of-work-in-the-digital-era.pdf>
- Online, T. S. (2021, June 14). *Transforming careers for the digital age*. The Star. <https://www.thestar.com.my/starpics/2021/06/14/transforming-careers-for-the-digital-age>
- Oxford Economics. (2012). *Global Talent 2021: How the new geography of talent will transform human resource strategies*. <https://www.oxfordeconomics.com/Media/Default/Landing%20pages/Talent%20UCLA/global-talent-executive-summary.pdf>
- The World Bank. (2021, March 16). *Malaysia to Achieve High Income Status Between 2024 and 2028, but Needs to Improve the Quality, Inclusiveness, and Sustainability of Economic Growth to Remain Competitive*. World Bank. <https://www.worldbank.org/en/news/press-release/2021/03/16/aiminghighmalaysia>
- UNDP. (n.d.). *Sustainable Development Goals. United Nations Development Programme*. Retrieved September 21, 2021, from <https://www.undp.org/sustainable-development-goals>
- van Dam, N. (2018, August). *Elevating Learning & Development: Insights and practical guidance from the field*. McKinsey & Company. <https://www.mckinsey.com/-/media/mckinsey/business%20functions/organization/our%20insights/elevating%20learning%20and%20development/elevating-learning-and-development-intro.pdf>
- Why skills - and not degrees - will shape the future of work*. (2020, September 21). World Economic Forum. <https://www.weforum.org/agenda/2020/09/reckoning-for-skills/>
- World Economic Forum. (2020). *Human Capital as an Asset: An Accounting Framework to Reset the Value of Talent in the New World of Work*. [http://www3.weforum.org/docs/WEF\\_NES\\_HR4.0\\_Accounting\\_2020.pdf](http://www3.weforum.org/docs/WEF_NES_HR4.0_Accounting_2020.pdf)
- Zahidi, S., Ratcheva, V., Hingel, G., & Brown, S. (2020, October). *The Future of Jobs Report*. World Economic Forum. [http://www3.weforum.org/docs/WEF\\_Future\\_of\\_Jobs\\_2020.pdf](http://www3.weforum.org/docs/WEF_Future_of_Jobs_2020.pdf)
- Zainal, F. (2021, June 14). *Transforming careers for the digital age*. The Star. <https://www.thestar.com.my/starpics/2021/06/14/transforming-careers-for-the-digital-age>

#### DISCLAIMER

All rights reserved. No part of this publication or information contained on this website/report/document/powerpoint slides may be reproduced, distributed, stored in or introduced into a retrieval system, or transmitted in any form or by any means (graphical, electronic, mechanical, photocopying, recording, taping or otherwise) without the prior written permission of the Institute for Capital Market Research Malaysia.

The information contained in this website/report/document/powerpoint slides is for general information purposes only. The Institute for Capital Market Research Malaysia does not warrant the accuracy, adequacy or completeness of the information and data contained in this website and expressly disclaims liability for errors or omissions in this information and data. No warranty of any kind, implied, expressed or statutory, is given in conjunction with the information and data.



**Institute for Capital Market Research**  
Level 2, Persiaran Bukit Kiara,  
Bukit Damansara,  
50490 Kuala Lumpur,  
Malaysia

T +603 6204 8017

E [enquiry@icmr.my](mailto:enquiry@icmr.my)

[www.icmr.my](http://www.icmr.my)