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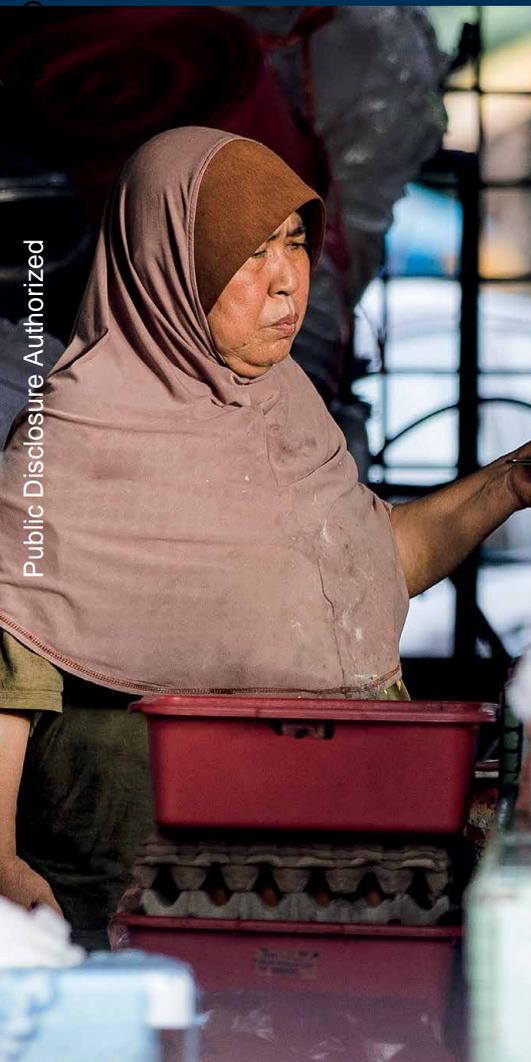
SOCIAL PROTECTION AND JOBS
GLOBAL PRACTICE

NOVEMBER 2020

THE MALAYSIA DEVELOPMENT EXPERIENCE SERIES

A Silver Lining

Productive and Inclusive
Aging for Malaysia



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List of Acronyms

ADLs	Activities of Daily Living
ALMPs	Active Labor Market Policies
ASEAN	Association of Southeast Asian Nations
B20	Bottom 20
B40	Bottom 40
BA	Public Assistance (<i>Bantuan Am</i>)
BOT	Financial Assistance for Older Persons (<i>Bantuan Orang Tua</i>)
BSH	Cost of Living Aid (<i>Bantuan Sara Hidup</i>)
DOSM	Department of Statistics Malaysia
EIS	Employment Insurance System
EPF	Employees Provident Fund
GDP	Gross Domestic Product
GNI	Gross National Income
HRDF	Human Resource Development Fund
IADLs	Instrumental Activities of Daily Living
IMF	International Monetary Fund
JKM	Department of Social Welfare (<i>Jabatan Kebajikan Masyarakat</i>)
JPK	Department of Skills Development (<i>Jabatan Pembangunan Kemahiran</i>)
KWAP	Public Service Pension Fund (<i>Kumpulan Wang Persaraan</i>)
LTAT	Armed Forces Pension Board Fund (<i>Lembaga Tabung Angkatan Tentera</i>)
LTGM	Long-Term Growth Model
MOF	Ministry of Finance
MOH	Ministry of Health
MOHR	Ministry of Human Resources
MySPC	Malaysia Social Protection Council
NCDs	Noncommunicable diseases
NGO	Non-Governmental Organization
NOSS	National Occupational Skills Standard
NRI	Natural Rate of Interest
OECD	Organization for Economic Co-operation and Development
PAWE	Activity Centre for Older Persons (<i>Pusat Aktiviti Warga Emas</i>)
PLI	Poverty Line Income

PPP	Public Private Partnership
PRS	Private Retirement Scheme
PWDs	Persons with Disabilities
RE	<i>Rumah Ehsan</i>
RLE	Remaining Life Expectancy
RM	Ringgit Malaysia
RS	<i>Rumah Sejahtera</i>
RSK	<i>Rumah Seri Kenangan</i>
RWT	<i>Rumah Warga Tua</i>
SOCSO	Social Security Organization
TFP	Total Factor Productivity
UN	United Nations
UN WPP	United Nations World Population Prospects
UPWE	Senior Citizens Care Unit (<i>Unit Penyayang Warga Emas</i>)
US\$	United States Dollar



Executive Summary

Introduction and Context

In 2020, Malaysia passes a crucial milestone in its demographic trajectory and becomes an aging society. Driven by a precipitous decline in fertility accompanied by a sustained rise in life expectancy, in recent years Malaysia has seen an uptick in the pace of demographic change. As a result, in 2020 it will transition to an aging society which is defined per the international convention as having 7 percent or more of the population age 65 and above (World Bank 2016). Henceforth, Malaysia will age rapidly. After 24 years, it will become an aged society, with the share of the population age 65 and above reaching 14 percent. Only 12 years later, the country will become super-aged, with the share reaching 20 percent (see Figure 0.1). Malaysia's transition from an aging to an aged society will happen at a similar pace to Japan's, whereas it took 115 years in France, 73 years in Australia and 69 years in the United States. In parallel, the old-age dependency ratio—the number of persons over the age of 65 compared with the population age 15 to 64—is projected to rise substantially from 10.4 percent in 2020 to 21.7 percent in 2040 (see Figure 0.2), accompanied by a net increase in the number of older persons by 130,000 to 210,000 per year. Although life expectancy has increased, not all of the increased years of life are spent in good health. Malaysia's healthy life expectancy at birth is estimated at 66.6 years in 2016, about a decade less than life expectancy. This divergence is partly due to the rising prevalence of noncommunicable diseases (NCDs). For example, the prevalence of diabetes among adults increased from 11.2 percent in 2011 to 18.3 percent in 2019.

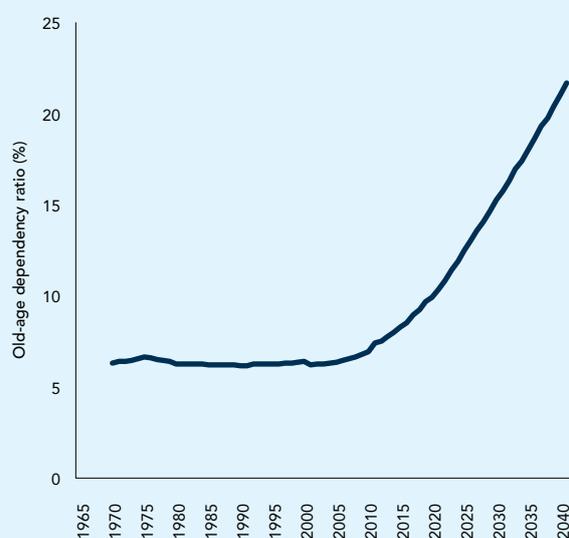
FIGURE 0.1: Transition from aging to aged and super-aged status by country, Years



Source: Authors' calculations based on UN WPP 2019.

Note: Data for Australia, France and the United Kingdom are truncated as these were aging societies even before 1950. Blue bars represent the transition period from aging to aged. Orange bars represent the transition period from aged to super-aged.

FIGURE 0.2: Old-age dependency ratio, Percentage



Source: UN WPP 2019.

Rapid aging will be one of the most crucial megatrends affecting Malaysia in coming decades, raising policy challenges in areas such as employment, income security, health care, and aged care. According to macroeconomic projections undertaken for this report, aggregate economic growth in Malaysia is expected to decline from 4.5 percent in 2019 to about 1.8 percent by 2050 and demographic changes

in the form of slower population growth and a shrinking working-age to total population ratio will account for about a third of the decline (see Table 0.1). Equally important, aging threatens to increase poverty and vulnerability among older persons, especially those who are frail and in need of aged care and long-term care services. Today, poverty rates among this population group are only slightly higher than among the population as a whole—using the bottom 20 (B20) per capita income threshold as the poverty line. In 2016, the poverty rate was 21 percent for households with older persons and 19.7 percent for households without them (see Table 0.2). However, the poverty incidence for older persons rises with age and there are concerns that the vulnerability of older persons will increase as the total dependency ratio increases and families might accordingly struggle to cope. Furthermore, without strengthened public health care, the prevalence of disabilities accumulated over a life span will further increase care needs. In addition, more and more older persons are living alone, and there are concerns that household incomes might become more volatile both globally and in Malaysia. All these challenges are becoming more pressing as Malaysia is likely to transition from an upper middle-income to a high-income economy within the next few years, despite a COVID-19 induced recession in 2020, and the aspirations of its expanding middle class regarding jobs, income, and well-being continue to grow (see World Bank forthcoming).

TABLE 0.1: Contributors to decline in headline GDP growth, Percentage

Contributor	Share (%)
Population growth	19
Growth in total dependency ratio	12
Total factor productivity growth	12
Human capital growth	2
Public invest. (falling effectiveness)	43
Private capital to output ratio (falling effectiveness)	12
Baseline	100

Source: Authors' calculations based on LTGM.

TABLE 0.2: Poverty rates for households with and without older persons, Percentage

Household type	B20 poverty line	B40 poverty line
No older persons present	19.7	39.3
Older persons present	21.0	42.3
All households	20.0	40.0

Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

The policy challenges created by aging should not be underestimated, but neither should the opportunities of a silver economy. Harnessing the productive potential of persons age 50 and above can help mitigate the growth effects of aging and address talent shortages while the aged care sector can become a new driver for economic growth, job creation, improved social services, and a better quality of life. In addition, recent studies have highlighted the economic potential offered by an aging society. In this context, the term silver economy has been coined to encompass all sources of opportunities that arise from economic activities to serve the needs and demands of older persons. Studies from high income countries demonstrate that older persons can potentially be relatively wealthy consumers compared with young generations. Meeting the increasing needs and demands of older persons will lead to the creation of new markets and business opportunities to spur growth, create jobs, and increase tax revenues.

While rapid aging is crucially important and will become even more so in coming decades, through the right choice of policies, the Government of Malaysia can help the country achieve productive and inclusive aging. Aware of both the challenges and opportunities of aging, relevant policy documents already

reflect inclusive and productive, as well as healthy aging as key policy objectives. In 1995, the National Policy for the Elderly was Malaysia's first strategic policy on aging. To implement this policy, the National Advisory and Consultative Council for Older Persons was set up in 1996 and a Plan of Action for the Older Persons was formulated in 1998. Based on a review of the first strategic policy and the Plan of Action, the National Policy for Older Persons and the Plan of Action for Older Persons were introduced in 2011 with the goal to allow older persons to have a high sense of self-worth and dignity through development, health and well-being, as well as an enabling and supportive environment. More recently, the 11th Malaysia Plan has included initiatives to improve the supportive environment for older persons and to promote active aging while the Mid-Term Review of the Plan has emphasized the need to enhance older persons' living environments.

The COVID-19 pandemic has resulted in an unprecedented crisis with an enormous health and human toll, as well as exacerbated many of the policy challenges raised by aging both in the short term and more structurally. There are concerns that the COVID-19 crisis is creating a "new normal" for the care, income support and employment of older persons. COVID-19 infections in several aged care homes in Malaysia, including in unlicensed homes, show that older persons living in institutional settings are an exceptionally vulnerable population group. They also demonstrate the importance of service standards, in particular, health and safety standards, as part of a broader response to protect this group. In addition, the crisis may exacerbate the economic vulnerability of older persons while reducing their savings for retirement. This reduction is due to declining contributions to the Employees' Provident Fund (EPF)—the retirement savings institution with the largest coverage in Malaysia—as well as withdrawals from EPF accounts and declines in asset prices. Finally, the very elevated rates of unemployment and underemployment due to the crisis lend urgency to policies that allow workers who have lost their employment, including older workers, to return to work. Recognizing that there is no evidence that increased employment among late-career workers negatively affects the employment prospects of younger workers, required policies might include the provision of enhanced and tailored opportunities for upskilling and reskilling that take into account both temporary and potentially permanent changes in labor demand brought about by the crisis.

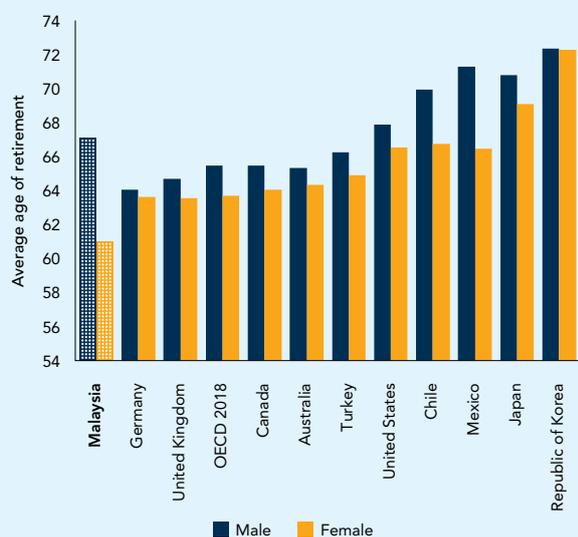
The report analyzes Malaysia's demographic, socioeconomic and macroeconomic contexts, as well as three select key policy areas where critical knowledge gaps exist—employment, income security, and aged care. Although the report recognizes that aging cuts across multiple sectors and requires a life cycle perspective, not all sectors are comprehensively addressed. Nutrition, basic education, and health care are notable omissions, not because these are any less important than employment, income security, and aged care, but because the focus of the report is on select policy areas with large knowledge gaps. Similarly, the report recognizes that aging is a cross-cutting and multi-dimensional issue with productive aging, inclusive aging and healthy aging as key, equally important dimensions, but does not discuss healthy aging in detail.

Methodologically, the report relies on a mixed methods approach that combines quantitative, qualitative and institutional research. The quantitative research is conducted using recent, nationally representative data from the Department of Statistics Malaysia in addition to international data sources. Complementing the quantitative investigation, qualitative and institutional analyses are used to improve the understanding of the constraints behind the most significant challenges identified by quantitative data. The qualitative analysis focuses on aged care and employs semi-structured interviews with diverse stakeholders to answer questions regarding the roles and responsibilities of older persons, families, communities, NGOs, the private sector, and the Government. The interviews also take into account caregivers' and older persons' experiences, preferences, ideas, concerns, and expectations. The institutional analysis encompasses a desk review of relevant laws, policies, and regulations.

Findings

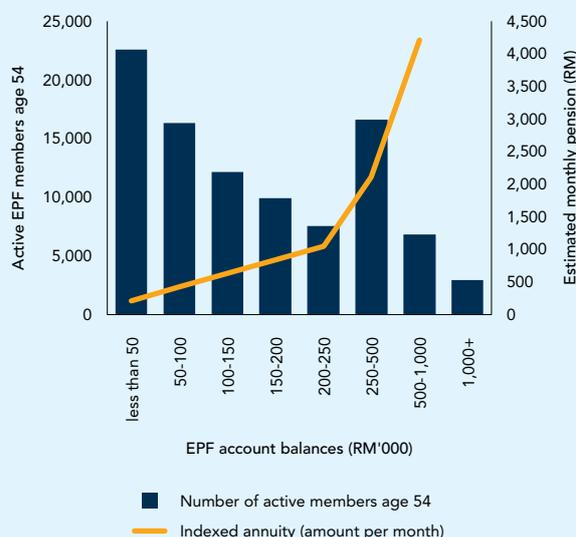
Compared to other upper middle- and high-income countries, the employment rate of those age 50 to 74 in Malaysia is low, especially among women, and some persons in this age group struggle to find flexible, productive and inclusive employment. In Malaysia, the employment rate—calculated as the share of persons employed at a given age—for persons age 50 to 74 stands at 45.9 percent, which is lower than in most other upper middle- and high-income countries. The differences between Malaysia and comparator countries are, to a large extent, driven by Malaysia’s relatively low employment rates for persons between age 50 and 64, as well as for women (see Figure 0.3). In turn, the low employment rate among persons between age 50 and 64 is arguably at least partly driven by the relatively low minimum retirement age and low EPF minimum withdrawal age while women face constraints related to childcare, the legal environment, and gender norms and attitudes. As workers age, prevalent types of employment also change. Both self-employment and part-time work are relatively more common among older workers. Outside of agriculture, 19 percent of employed men and women age 40 to 44 are self-employed, but this is the case for 43.1 percent of employed men and half of employed women age 60 to 64. While these changes in the types of jobs are arguably at least partly due to workers’ preferences, there is clear room for an improved policy environment to allow more of them to find flexible, productive and inclusive employment. Also of note, there is no evidence that increased employment among older workers negatively affects the employment prospects of younger workers either in Malaysia or internationally.

FIGURE 0.3: Average age of retirement by gender and country, Years



Source: Authors’ calculations based on Household Income and Basic Amenities Survey 2016 (DOSM) and OECD.

FIGURE 0.4: Active EPF members age 54 and estimated pensions, Number and RM



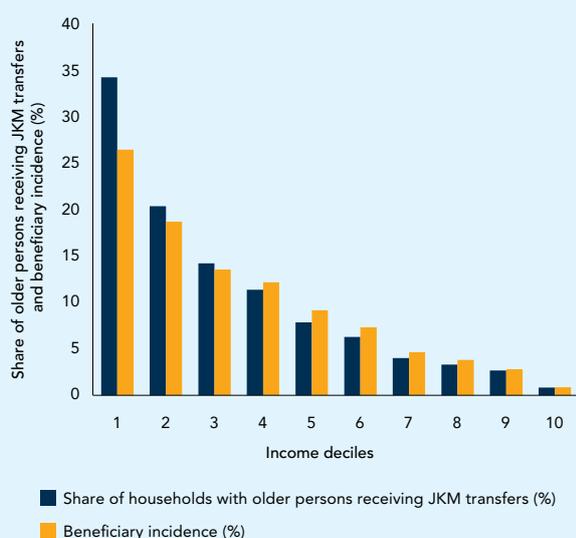
Source: Authors’ calculations based on EPF.

Adequacy and coverage of Malaysia’s system of contributory social insurance and non-contributory social assistance for older persons are major challenges. EPF as Malaysia’s main private-sector retirement savings scheme is a defined-contribution provident fund. Seventy percent of EPF contributions are placed in Account 1, dedicated to retirement savings, while the remaining 30 percent goes into Account 2, which can be used for broader purposes. The reliance on a defined-contribution provident fund places Malaysia in the relatively unusual situation that—outside of the civil service pension system—institutions providing

old-age income security pose no fiscal risks. At the same time, in the absence of a broad non-contributory social assistance program for older persons, almost all old-age income security risks rest with these persons and their families. In fact, at 60.8 percent, participation in contributory retirement savings institutions is low, especially when compared to an aspirational peer group of high-income countries. Coverage is especially low among lower-income households, with less than a fifth of working-age B20 being active EPF contributors. In addition, the majority of EPF contributors will only receive very low benefits in retirement, because participation in covered employment is intermittent and the minimum withdrawal age is low. Almost three quarters of workers at age 54 have balances of under RM250,000 (see Figure 0.4). Translated into an indexed annuity, almost three quarters of workers will have a monthly benefit of less than RM1,050, only slightly more than the poverty line income (PLI) of RM980 before its recent revision. As most older persons in Malaysia have inadequate EPF benefits or none at all, it falls either to families or to very limited non-contributory social assistance to protect older persons against poverty and destitution. The Department of Social Welfare (*Jabatan Kebajikan Masyarakat* or JKM) provides cash assistance for poor and vulnerable older persons through the Financial Assistance for Older Persons (*Bantuan Orang Tua* or BOT) program, among others. Although JKM programs are targeted toward the poor, their budget allocation and coverage are both small. Only slightly more than a quarter of households with members age 65 and older in the B20 receive assistance from JKM (see Figure 0.5).

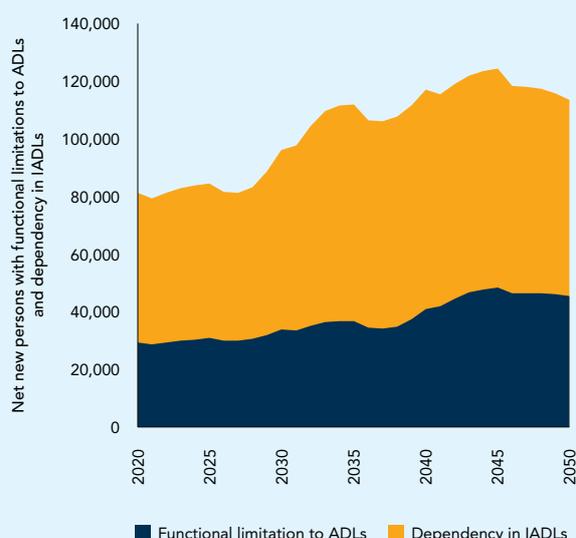
Rapid aging accompanied by a changing socioeconomic context and increasing prevalence of NCDs will threaten existing aged care arrangements. As in many other countries in East Asia, familial provision of aged care has long played a critical role in Malaysia whereby frail older persons get support and care from their spouses, children, and other relatives. However, this traditional arrangement shows signs of weakening as the typical household structure changes from large, multi-generational households toward small nuclear ones. While co-residence remains common, the share of three-generation households declined from 41.1 percent in 2004 to 30.7 percent in 2016. The decline in co-residence may affect households’ ability to informally provide care to older household members. In parallel, there are more and more persons who

FIGURE 0.5: Share of households with older persons covered by JKM programs and beneficiary incidence, Percentage



Source: Authors’ calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

FIGURE 0.6: Projected annual net new persons with ADLs limitations or IADLs dependencies, Number



Source: Authors based on UN WPP.

have a high probability of having functional limitations in activities of daily living (ADLs) and dependency in instrumental activities of daily living (IADLs).¹ The number of persons with ADLs functional limitations is projected to more than double from 2020 to 2040 while the number of persons with IADLs dependency is projected to increase by about one million per decade (see Figure 0.6), reflecting the lifelong impact of a high prevalence of NCDs in addition to demographic trends. Already today, an estimated 250,000 older persons have dementia while many care needs are unmet—according to the National Health and Morbidity Survey 2018, 30.8 percent of those age 60 and above are malnourished. On top of that, the survey also found that 30.8 percent of those in that same age group have poor social support. Meanwhile, in terms of formal provision, institutional care is very limited and home- or community-based care is still at an early stage of development. Public financing of aged care is very limited as well and weighted toward institutional care with relatively low quality of services for a small number of destitute older persons. Coverage of private institutional care is low and uneven across space. While there are some experiments with a focus on urban areas to explore viable business and service delivery models for home, community-based and institutional care, there are also significant challenges with regard to service quality, human resources, and governance arrangements.

Aging poses particular challenges for women’s employment, income security and aged care needs.

Across all age groups, employment rates are significantly lower for women than for men. The gap is largest between age 50 and 60 as women on average retire earlier. In 2016, 59.7 percent of men age 60 but only 17.9 percent of women age 60 were employed. Arguably, gender differences in employment rates are due to constraints related to childcare, the legal environment, and norms and attitudes (see World Bank 2019a). Women also have both lower rates of EPF coverage and lower balances. In addition to the low employment rates among women, this is because a relatively large share of women who participate in the labor market is self-employed or engaged as unpaid family workers and thus often not covered by social insurance. Moreover, women who are covered by social insurance on average have lower EPF balances than men, partly due to the prevailing gender wage gap. As a result, the average EPF balance at age 54 is RM177,000 for women and RM233,000 for men. With regard to aged care, since women on average live longer, they have particularly pronounced care needs. In addition, the large majority of aged care workers are women. This is the case for 55.8 percent, 77.4 percent, and 93.6 percent of personal care workers, health workers, and domestic workers, respectively. Thus, strengthened arrangements for training and qualifications to upgrade skills of aged care workers can have particularly beneficial effects for women.

Policy Options

An integrated, interagency policy approach can address challenges and grasp opportunities in a systematic and mutually reinforcing way. Reducing some of the barriers to productive and inclusive aging will require clear prioritization and finely calibrated policy approaches. At the same time, many of the recommended policy approaches to achieve productive and inclusive aging will address more than one barrier and different approaches will be mutually reinforcing and can create opportunities for a silver economy. For instance, an increase in the minimum retirement age to 65 can not only improve employment opportunities for older workers, but also foster old-age income security. In addition to that, more productive and inclusive aging is certainly a cross-sectoral endeavor; some of the most crucial policy approaches such as strengthening the governance of the aged care sector will necessitate cooperation between different

¹ ADLs correspond to essential elements of self-care such as feeding, toileting, mobility, dressing, and cleaning, and hence limitations raise the need for substantive care services. IADLs are instrumental to enabling independent living—such as food preparation, shopping, housekeeping, and managing finances—which may not be required daily and necessitate lower intensity care services such as home help.



ministries and agencies. Therefore, a systematic and integrated interagency approach to the promotion of productive and inclusive aging—as well as one that adopts a life cycle perspective, mainstreams approaches to address the specific constraints faced by women, and is mindful of political economy considerations—will have the most pronounced and sustainable impact. Ideally, this approach would be guided by an integrated strategy and supervised by a steering committee.

The promotion of productive and inclusive aging will require policies that foster the productive employment of all workers, provide minimum income protection to all older persons, and build an inclusive aged care system. General policy directions as well specific short-term, medium-term and long-term policy options are laid out in Table 0.3, with the caveat that this distinction is not always entirely clear-cut and that for some of the long-term policy options to be effective, implantation needs to begin in the short or medium term. In the future, Malaysians will have to work longer in order to ensure adequate financial protection in old age. But they will also be more able to do so, being healthier for longer, with less physically demanding occupations, and with more digitally-enabled work places. As in nearly all high-income countries, longer working lives will in turn require gradual adjustments to the minimum retirement age in line with increasing longevity, and in the EPF minimum withdrawal age, among other policy parameters. In parallel, policies are needed that foster workers' productive employment—such as enhanced opportunities for training and lifelong learning. In addition, the provision of minimum income protection of older workers will require improvements in the coverage and adequacy of social insurance schemes, as well as the introduction of a modest, broadly targeted tax-financed social pension. Finally, for the aged care sector to become a new driver of economic growth, it will be crucially important to create an enabling market and regulatory environment for private aged care provision, to strengthen the governance of the sector, and to selectively increase public financing in line with available fiscal space.

TABLE 0.3: Overview of policy recommendations

General Policy Directions	Short-term Policy Options	Medium-term Policy Options	Long-term Policy Options
1 Foster the productive employment of all workers, including older workers.	Provide enhanced opportunities for training and lifelong learning.	Develop regulations for older workers' productive and flexible employment.	Gradually raise the min. retirement age to 65; link it to life expectancy at retirement thereafter.
	Facilitate the adoption of age-management strategies by companies.	Improve women's economic opportunities through better childcare and other measures.	Consider piloting incentives to encourage the employment of older workers.
2 Provide minimum income protection to all older persons.	Develop an integrated vision of a system for old-age income protection.	Introduce a modest, broadly targeted tax-financed social pension.	Adjust the minimum withdrawal age for EPF Account 1 and rethink the role of Account 2.
	Broaden EPF coverage to more of the self-employed and informal sector workers.	Establish a one-stop shop for EPF, SOCSO and HRDF contributions.	Explore annuitization options and longevity insurance for EPF balances.
3 Build an inclusive aged care system.	Develop a systematic and actionable aged care strategy based on a solid assessment.	Streamline and harmonize licensing requirements for aged care facilities.	Upgrade skills of aged care workers through strengthened training arrangements.
	Improve quality standards of aged care homes to ensure health and safety.	Strategically reorient public financing toward home and community-based aged care.	Selectively increase public financing to incentivize market-oriented care provision.

POLICY DIRECTION 1 Foster the productive employment of all workers, including older workers, through a comprehensive set of demand- and supply-side policies. A first policy option to foster productive employment in the short term is to provide enhanced opportunities for training and lifelong learning that take into account the specific circumstances of older workers, such as their generally relatively low level of education. In addition, policies could encourage and facilitate the adoption of age-management strategies encompassing work organization, work equipment, working time policies, and training, among other aspects. In the medium term, it is recommended to develop a regulatory framework for the productive and flexible employment of older workers and to facilitate part-time and other flexible forms of employment. In order not to exacerbate existing gender imbalances in Malaysia's labor market, it will also be important to address women's specific constraints to labor market participation. Relevant initiatives include better availability, quality and affordability of childcare, reforms of the legal environment and improved support for parents in line with international legal norms, and policies that address gender norms and attitudes (see World Bank 2019b). A long-term policy option is to gradually increase the minimum retirement age to 65, and thereafter link it to life expectancy. Macroeconomic projections indicate that increasing the retirement age to 65 could raise GDP growth by 0.3 percentage points per year while a review of the relevant international experience and data for Malaysia finds no evidence that increased employment among older workers negatively affects the employment prospects of younger workers. Also in the long term, these initiatives could be coupled with the piloting of financial incentives to encourage the employment of older workers—such as targeted, conditional, and time-bound wage subsidies.

POLICY DIRECTION 2 Provide minimum income protection to all older persons through increased coverage and adequacy of savings and social insurance schemes, as well as a modest, broadly targeted tax-financed social pension. In the short term, an integrated vision of a system for old-age income security that provides minimum protection to all older persons and policy measures in the areas of both social insurance and social assistance can be developed. With regard to social insurance, proactive measures can improve the coverage and adequacy of relevant schemes, including EPF retirement savings and the Social Security Organisation’s work injury, disability and survivorship insurance schemes. Several measures could increase the proportion of workers actively contributing to EPF and ensure that retirement savings could be sustained for longer. To increase coverage, oversight could be improved, including through a requirement for the registration of all workers as a condition for the granting of business licenses and/or government contracts. To raise average balances, in the long term the minimum withdrawal age for EPF could gradually be increased to 65 through a well-considered transition process, for instance over a period of 20 years (which of course would need to begin in the short or medium term). In addition, consideration could be given to converting all contributions to EPF wholly into retirement savings, to transitioning to phased withdrawals of EPF balances, and to exploring longevity insurance and annuitization options. Over time, the EPF contribution rate could be reduced as the benefit eligibility age increases, provided that there is an observed increase in coverage and adequacy. However, even with all these measures it is unlikely that social insurance schemes can ever cover the entire labor force. Thus, a modest, broadly targeted tax-financed social pension may also be required. In the short or medium term, one practical option would be to introduce a social pension of RM350 per month targeted at the B40 age 65 and over and using the BSH implementation system.

POLICY DIRECTION 3 Build an inclusive aged care system with an enabling market and regulatory environment for private not-for-profit provision, strengthened governance, and selectively increased public financing. In the short term, the development of an inclusive aged care system could be guided by a systematic and actionable aged care strategy which in turn could be based on a comprehensive assessment and diagnostic. In light of the COVID-19 pandemic, it will be particularly crucial to continuously improve the aged care infrastructure and service standards to ensure the health and safety of residents of aged care homes. In the medium term, institutional barriers could be removed and licensing requirements and processes for existing unlicensed aged care facilities and potential new market entrants could be streamlined and harmonized. Furthermore, the Government’s role has already begun to shift from a “supplier and provider” to a “purchaser and regulator” of aged care services. However, this process could be accelerated, including through the establishment of public-private partnerships, and through shifting to results- instead of input-based commissioning. In the long term, it will also be important to strengthen arrangements for training and qualifications to upgrade the skills of aged care workers. For publicly financed aged care services, an approach that combines needs assessments and means tests to determine the eligibility of older persons could be considered. Finally, it is recommended to increase and strategically reorient public financing for aged care services. In this context, public financing could shift toward home and community-based aged care, address imbalances across space, mobilize private and social investments, and extend the coverage of low-income households.



CHAPTER 1

Introduction

As the result of a profound development process that has included social and economic progress, health improvements, and technological advances, Malaysia is becoming an aging society in 2020.

Since the formation of today's Malaysia in 1963, the country has been transformed from a low-income economy dominated by agriculture and the exploitation of natural resources to a country at the cusp of high-income status with a strong and diversified manufacturing and services sector (see Abdur Rahman and Schmillen forthcoming). This development process has led to widespread though uneven income growth, and radically improved nutrition, health care and social service provision. Together with technological advances and changing social norms and attitudes, it has also led to a significant decline in fertility rates and increases in life expectancy. The average number of children born to a woman over her lifetime for the period from 1960 to 1964 was 6.4 but is two now (and continuing to fall), while life expectancy at birth has increased by more than two decades since the 1950s. In turn, the share of the population age 65 and above has increased from 3.4 percent in 1970 to 7.2 percent in 2020. This means Malaysia is now following the trajectory of many other countries that have undergone an economic transformation from low- to upper middle- or high-income status and a demographic transition from high fertility and mortality to low fertility and mortality. As a result, it is becoming an aging society according to the common definition of having more than 7 percent of the population age 65 and above.²

A balanced view of aging recognizes both the challenges and the opportunities that this process will present.

Aging is not simply a change in a country's demographic structure but also causes changes in social and economic structures, which will then affect economic growth and the conditions of families and communities. No doubt, in Malaysia as elsewhere, aging will bring significant challenges. In terms of macroeconomic impacts, there are concerns that aging may have a negative impact on long-term growth due to a shrinking labor force, lower public savings, and potentially slower technological adoption. In addition, due to aging a higher proportion of older persons may need public income support after they exit the labor market and more health care and social care services when they get frailer and more dependent. While these challenges should not be underestimated, a balanced approach recognizes that aging can also offer promising opportunities—this is the “silver lining” alluded to in the title of this report. For instance, harnessing the productive potential of older workers can help mitigate the growth effects of aging and address talent shortages. Many aging societies have promoted the development of the aged care sector as a new driver for economic growth, job creation, improved social services, and a better quality of life. Moreover, welfare improvements of older persons can also generate positive externalities for the whole society. For instance, they can create opportunities for older persons to take care of their grandchildren and family members, or to become volunteers. This will in turn promote social cohesion and social solidarity.

Aging is not only about “older persons” or about “the old” versus “the young.” Rather, to manage aging requires a life cycle perspective on policy design that recognizes the importance and consequences of behavioral change across the life cycle of individuals (see World Bank 2016). For example, the health of children affects their health as adults, saving for old age needs to start early, and the burden of taxation to provide services and benefits needs to be spread fairly across generations. In turn, better labor market prospects for older workers can improve a society's overall productivity and tax intake; better health promotion, primary health care services and health management can reduce morbidity rates and the prevalence of non-communicable diseases (NCDs) and other diseases, among older persons, and thus lower health expenditures; and better quality and more accessible aged care services can improve the quality of life of older persons and create jobs for younger ones.

² For a list of working definitions of technical terms used in this report, see Annex A.

The challenges and opportunities of aging for individuals, the economy and society are often two sides of the same coin. For instance, as people live longer, questions about how they can stay healthy and financially secure need to be answered. However, if the answers to these questions can be found, older persons can then make meaningful contributions to the well-being of their families and society more broadly. Thus, smart policies will consider a balanced approach that examines both the challenges and opportunities of aging to reduce costs and maximize benefits (see Table 1.1):

- **From a demographic perspective, aging can either lead to financial or care burdens or increase the number of healthy and productive persons in a society.** On the one hand, the aging process increases a society’s average age and the old-age dependency ratio, defined as the number of persons over age 65, compared with the working-age population age 15 to 64. This can cause financial, care and other burdens to families and society. On the other hand, with improvements in health and aged care provision, more older persons will live healthily and independently. With the right labor and skills policies, they can also have longer and more productive working lives and productively contribute to the economy and society (see Lee and Mason 2006).
- **From an economic perspective, aging may have a negative impact on long-term growth but may also nurture a silver economy.** According to canonical growth models, aging leads to a shrinking labor force and this in turn reduces economic growth. While this effect may to some extent be offset by human capital accumulation, aging may potentially also slow down economic growth due to its negative impacts on public savings due to increased health- and pension-related spending (whereas the impacts on

TABLE 1.1: Challenges and opportunities of aging

Dimensions	Challenges	Opportunities
Demography	<ul style="list-style-type: none"> • Disabilities and dementia • Demographic debt 	<ul style="list-style-type: none"> • Healthier longevity and self-fulfillment • Demographic dividend³
Economy	<ul style="list-style-type: none"> • Smaller workforce • Increasing public spending • Lower economic growth 	<ul style="list-style-type: none"> • Human capital accumulation • Silver economy • Job creation and tax contributions
Society	<ul style="list-style-type: none"> • Old-age poverty • Burden to families and communities 	<ul style="list-style-type: none"> • Resources and social capital • Social contributions and cohesion

Source: Authors.

FIGURE 1.1: Malaysia’s aging framework



Source: Authors based on National Policy for Older Persons.

3 The concept of demographic dividend was originally introduced by the United Nations Population Fund and refers to the economic growth potential that can result from shifts in the population age structure when the proportion of working age people in the total population is high, which offers opportunities because relatively more people are productive and can contribute to growth (see Section 2.2). Lee and Mason (2006) further developed the concept by differentiating between a first and a second demographic dividend, where the second demographic dividend comes mainly from augmented human capital accumulation and can thus be pronounced relatively late in a society’s aging process.

private savings are theoretically ambiguous). Indeed, many empirical studies for both the United States and Europe have found that economic growth slows roughly one-to-one with declines in labor force or population growth (see Lee and Mason 2017). Concurrently, there are other recent studies that have highlighted the economic potential offered by an aging society. In this context, the term silver economy has been coined to encompass all sources of opportunities that arise from economic activities to serve the needs and demands of older persons. Studies from both high income countries and emerging economies in Asia demonstrate that older persons can potentially be relatively wealthy consumers compared with young generations. This can lead to the creation of new markets and business opportunities to spur growth, create jobs and increase tax revenues (See Box 1.1). In addition, it has long been recognized that enabling more older workers to stay productive and in the labor market can be a key source of growth for aging societies.

- **From a societal perspective, old-age poverty may increase if there are more older persons without adequate income support or care, while at the same time older persons may take care of other family members or become volunteers.** Aging can cause financial and care pressures for both older persons as care recipients and their families as informal caregivers. With economic transformation and rapid urbanization, many younger people move from rural areas to towns and cities, leaving older persons behind and putting pressure on rural communities. At the same time, older persons also have assets such as their social capital—that is, their networks of relationships—that allow them to make productive contributions to their families and communities. For instance, they can provide support within their own households by taking care of grandchildren or other family members, as well as participate in community activities as volunteers. They also often have historical memories of local communities and events, which can strengthen the communities' culture, social cohesion and social solidarity.

World Bank projections indicate that Malaysia is likely to transition from an upper middle-income economy to a high-income economy within the next few years, despite a COVID-19 induced recession in 2020 (see World Bank forthcoming). Navigating the journey to high-income country status raises a number of questions about not just the speed of Malaysia's growth, but also the quality of growth and its sustainability. Most significantly, there is a growing sense that the aspirations of Malaysia's middle-class are not being met and that the economy does not produce enough well-paid, high-quality jobs. There is also a widespread sense that the proceeds of growth have not been equitably shared between the richest and the poorest, and that increases in the cost of living are outstripping incomes, especially in urban areas. Malaysia's transition to high-income status and the growing aspirations of its citizens regarding jobs, income and well-being lend additional urgency to addressing the challenges posed and opportunities offered by aging.

While the rapid aging process is crucially important and will become even more so in coming decades, demography is not destiny. Various analysts and observers have highlighted that aging is one of the key megatrends that will shape tomorrow's world (see McKinsey 2015, Deloitte 2017 and World Economic Forum 2017). However, through the right mix of policies, governments can help societies adapt to rapid aging and improve the well-being of all.

The Government of Malaysia has already highlighted the importance of inclusive and productive, as well as healthy aging in its relevant policy documents. In 1995, the National Policy for the Elderly was Malaysia's first strategic policy on aging. To implement this policy, the National Advisory and Consultative Council for Older Persons was set up in 1996 and a Plan of Action for the Older Persons was formulated in

BOX 1.1

The Silver Economy

The term silver economy has been coined to encompass all sources of opportunities that arise from economic activities that serve the needs and demands of older persons. While there is no common definition of the term silver economy, usually it is meant to include both the products and services that are directly purchased by older persons and any other economic activities that are indirectly induced by these purchases. Thus, it encompasses the unique cross-section of economic activities related to the production, consumption and trade of goods and services relevant for older persons.

Various estimates from Europe, the United States and beyond show that the silver economy is very large and growing. Bank of America Merrill Lynch (2014) estimates that in 2014, the global silver economy stood at US\$7 trillion, which would have made it the world's third largest economy if it had been a country. The same study estimates that by 2020 the global purchasing power of older persons age 50 and above would reach US\$15 trillion. Similarly, a set of studies by the European Commission (2015a and 2015b) reports that in 2015, the silver economy contributed over EUR4.2 trillion to the European Union (EU)'s gross domestic product (GDP) and sustained over 78 million jobs across the EU. This would be equivalent to 29 percent of EU GDP and 35 percent of its employment. According to the same set of studies, by 2025 the EU's silver economy is projected to reach a GDP contribution of EUR6.4 trillion and 88 million jobs. This would be equivalent to 32 percent of the EU's GDP and 38 percent of its employment. A study for the United States by Accius and Suh (2019) argues that the silver economy contributes US\$8.3 trillion to the United States' economy each year, or 40 percent of its GDP. The same study estimates that the silver economy contributes a further US\$745 billion per year worth of unpaid non-market activities such as volunteering and caregiving. In addition, the study argues that the silver economy contributed US\$2.1 trillion in tax revenue to the United States in 2018 and that this tax revenue will increase four times by 2050. Finally, according to the study, in 2018 the silver economy supported 88.6 million jobs in the United States either directly or indirectly, and this is projected to grow to 102.8 million jobs in 2050.

Some recent studies indicate that the silver economy has even more potential in Asia than in Europe. A report by the World Data Lab (2019) estimates that the total annual spending power (in 2011 US\$ adjusted for purchasing power parity) by persons age 60 and over in Asia will increase from US\$4.2 trillion in 2019 to US\$8.6 trillion in 2030. In comparison, the total annual spending power by persons age 60 and over in Europe will rise from US\$3.7 trillion to US\$5.2 trillion. The report's projections also show that in spite of this impressive rise, older persons in Asia will still account for a smaller share of overall purchasing power than in Europe—15 percent as compared to 28 percent in Europe. But even though the silver economy's share of overall purchasing power remains largest in high-income economies, given the size of emerging economies in Asia the silver economy in these economies is very sizeable. Again according to World Data Lab (2019), by 2030 the spending power of Chinese seniors is expected to grow to \$3.2 trillion while the Indian silver economy is expected to experience explosive growth, to almost \$1.4 trillion in spending power. Also at the country level, World Data Lab (2019) projects that Malaysia is expected to experience around 40 percent growth of the total annual purchasing power by persons age 60 and over from 2019 to 2030.

1998. Based on a review of the first strategic policy and the Plan of Action, the National Policy for Older Persons and the Plan of Action for Older Persons were introduced in 2011. The National Policy for Older Persons presents a conceptual framework with five dimensions and corresponding long-term policy goals (see Figure 1.1). While this framework is largely focused on the well-being of older persons instead of providing a wider strategy for how Malaysia's society can manage aging, it nevertheless reflects a strong commitment from the Government to create a policy environment that allows older persons to enjoy a respected life and be independent with dignity by optimizing their self-potential through a productive, healthy, active, positive, and supporting aging process. Following the introduction of the National Policy for Older Persons, the National Advisory and Consultative Council for Older Persons was strengthened. In addition, promotion and advocacy, lifelong learning, safety and security, governance and shared responsibility, intergenerational solidarity, and research and development were identified as six priority areas for interventions.

Following the introduction of the National Policy for Older Persons, aging has been incorporated into Malaysia's five-year national development plans and specific policies, regulations and programs have been further introduced.

The 11th Malaysia Plan has included specific initiatives to improve the supportive environment for older persons and to promote active aging. These have been reinforced in the Mid-Term Review of the Plan which has emphasized the need to enhance older persons' living environment. More specifically, the 11th Malaysia Plan has included a sub-strategy for "enhancing the living environment for the elderly". This sub-strategy highlights specific initiatives regarding, for example, elderly-friendly infrastructure, the streamlining of social protection, enhanced research capacity to support active aging, and the expansion of lifelong learning for older persons. While these initiatives are closely aligned with the National Policy for Older Persons, at least in part they are at a relatively initial stage, leaving more room for further development and refinement for the 12th Malaysia Plan currently under preparation. Complementing the National Policy for Older Persons and the discussion of aging in five-year national development plans, specific policies, laws and regulations of relevance for the aging process include the National Housing Policy of 2011 that states the need for the Government and private sector to continue to provide affordable housing for specific target groups including older persons, the Third National Plan of Action for Nutrition of Malaysia 2016 to 2025 that includes nutritional guidance for older persons, and various laws and regulations covering aged care and health care for older persons.

As Malaysia continues to manage the challenges and opportunities of aging, it can learn from international experiences and lessons, including from other countries in East Asia.

As Malaysia ages, it faces similar challenges to other aged or aging countries in East Asia. In fact, some countries in the region are further advanced in the aging process than Malaysia, including Australia, China, Japan, the Republic of Korea, Singapore and Thailand. Malaysia can learn from these countries' experiences in managing the challenges and opportunities of aging, including in terms of changes and innovations in the relevant policy environment. For instance, starting in the 1960s, Japan has introduced a series of pension, health, long-term insurance, housing and transportation policies for aging and worked toward achieving an "age-free society" in which older persons will not be automatically considered senior citizens and will be encouraged to stay healthy and keep working. Korea has also introduced strategic plans and multiple active aging programs, in addition to a long-term care insurance system, and is now promoting an age-friendly economy. Australia is a good example for how to prepare for an aging society through evidence-based policy formulation. Since 2002, the Australian Government has produced a series of roughly five-yearly Intergenerational Reports to assess the long-term sustainability of current policies and the changes to Australia's population size and age profile that may impact economic growth, the workforce and public finances over the next 40 years. Singapore has also developed a relatively advanced policy environment for aging through continuous policy and legislative reforms. Compared to these countries, Thailand and China are still at an early stage of the aging process, which is more comparable to that of Malaysia. Nevertheless, they have formulated long-term

aging plans and piloted various relevant policies and programs. All these countries' experiences and lessons can be helpful for Malaysia as the country further develops its long-term aging strategies, updates its laws and regulations, and pilots and scales up specific programs (see Table 1.2).

Aging is a cross-cutting and multi-dimensional issue with productive aging, inclusive aging and healthy aging as key dimensions. International experiences and lessons suggest that it is best practice to develop an integrated approach to formulating aging-related policies and regulations. These policies and regulations would capture the relevant demographic, social and economic context, identify constraints and

TABLE 1.2: Aging policies in select East Asian countries

Country	Policies
Australia	The Aged Persons Homes Act 1954; the Residential Aged Care Services in Australia 2008; the Aged Care Packages in the Community 2008; the Home Care Package 1997; the Aged Care Act 1997, amended in 2006, 2013 and 2016; and the Aged Care Quality and Safety Commission Act 2018.
China	Aging and Aged Care Five-Year Development Plans since 2001, 10 th (2001-2005), 11 th (2006-2010), 12 th (2011-2015), and 13 th (2016-2020); Long-Term Aging Strategies (2019—2022/2035/2050); the Elderly Rights Protection Law 1995, amended in 2015 and 2018; National Aged Care System Pilots 2016—ongoing; and Long-Term Care Insurance pilots 2016—ongoing.
Japan	Universal Health Insurance Coverage (1961) and Universal Pension Coverage (1961); the Elderly Welfare Act (1963); the “Gold Plan” (1990-2000) for a massive investment for long-term care services; Decentralization in Social Welfare (1990); Act on Promotion of Construction of Accessible Building (1994); Pension Reform (1994); the Long-Term Care Insurance Scheme (2000); Act on Promotion of Accessible Public Transportation (2000); Comprehensive Reform in Tax and Social Security Reform (2012-); Promotion of Community-Based Integrated Care; Promoting Aging in Place and Building an “Age-Free Society”.
Republic of Korea	Senior Welfare Act 1981, amended in 2012, 2013, and 2015; Act on Prohibition of Age Discrimination in Employment and Aged Employment Promotion 1991; Act of The Long-Term Care Security for the Elderly 2007; Universal Health Coverage 1989; Long-Term Care Insurance System 2008; Aging Society and Population Master Plan established every five years: 1 st (2006-2010), 2 nd (2011-2015), 3 rd (2016-2020); Active aging and social welfare programs for older persons implemented by multiple government ministries; Leaping toward an “Age-Friendly” economy.
Singapore	Action Plan of Successful Aging 2016; Whole of Government Approach, Ministerial Committee on Aging, Age Planning Office and Agency of Integrated Care under MOH; Health care 2020 Masterplan; Pioneer Generation Package; Maintenance of Parents Act and Mental Capacity Act; Reemployment Act 2012 (extending retirement age); and immigration policies for foreign domestic workers and care staff.
Thailand	The First National Older Persons Plan 1986-2001; The Second National Older Persons Plan 2001-2021; the National Health Security Act 2002 for a universal health coverage; the Older Persons Act 2003 for elderly right including elderly allowance; the National Commission on the Elderly 2003; the National Long-Term Care Plan 2011; and the Elderly Fund to provide non-contributory pension, assistance and aged care services.

Source: Authors.

policy priorities, and implement tailored and sequential programs and interventions to promote productive, inclusive, and healthy aging. According to Malaysia's National Policy for Older Persons, productive aging is defined as the capacity of older persons to contribute through paid or voluntary work that brings meaning and satisfaction. Again according to the National Policy, healthy aging refers to efforts toward a healthy lifestyle, a better health system, and the creation of an environment and community which prioritizes health. Inclusive aging is defined in this report as the pursuit of an inclusive society where older persons have access to equitable health and social services, can participate in social and economic activities, and share the society's prosperity. All these three key dimensions of aging are important and interlinked. For instance, if older persons are healthy this creates the physical and mental preconditions that allow them to be active and productive. In addition, if older persons are productive this provides them with better income security and allows them a healthy lifestyle. Finally, if aging is inclusive the gains of social and economic development are more widely shared, which in turn creates productive opportunities for vulnerable older persons.

Against this backdrop, this report aims to contribute to a considered debate of the policy choices needed to achieve productive and inclusive aging in Malaysia. The report recognizes the importance of healthy aging but does not discuss it in detail. Instead, it focuses on productive and inclusive aging and the linkages and interactions between these two dimensions and healthy aging. In addition to highlighting the criticality of the issue for Malaysia's future development, in Chapter 1 the report adopts a balanced view that highlights both challenges and opportunities of aging. In Chapter 2, it follows a three-part approach to document the relevant context and state of preparedness and in Chapter 3 it investigates employment, income security for older persons, and aged care as three key policy areas. Finally, in Chapter 4 it develops a set of actionable policy recommendations. A comprehensive analysis of some other relevant policy areas, in particular, the health sector and the fiscal sustainability of the civil service pension system are left for future research. Similarly, while the report recognizes that managing aging requires a life cycle perspective on policy design it does not try to comprehensively address all relevant policy areas such as children's nutrition, human capital accumulation and medical care. Instead, the focus is on policies either directly affecting older persons, such as those related to aged care, or those with close linkages or spillovers between older persons and others, such as on employment and old-age income security. An even more in-depth analysis of some of the issues investigated in the report is also left for future research. For instance, the report recommends the development of a systematic and actionable aged care strategy but also recognizes that building on the analysis of this report, further in-depth analyses including a comprehensive assessment and diagnostic and benchmarking against international experiences and best practices would be needed to inform the development of such a strategy.

Chapter 2 of this report consists of three sections and documents the relevant context and state of preparedness including with regard to demographic trends, socioeconomic circumstances and macroeconomic impacts of aging. Section 2.1 highlights key aging trends in Malaysia and compares its demographic transition with those in other countries in East Asia. It also examines the factors underlying Malaysia's aging trends and discusses past, present and future developments in the size of the working-age population and total and old-age dependency ratios. In addition, it documents detailed patterns of aging across groups and space. Section 2.2 uses the World Bank's Long-Term Growth Model (LTGM) to analyze the impacts of aging on the long-term path of headline and per capita economic growth, private savings and other macroeconomic variables. Throughout the report, the LTGM is also used to quantitatively explore some of the policy reforms and structural changes that could mitigate the impacts of aging on long-term growth. Section 2.3 explores key patterns of well-being of older persons in Malaysia, including with regard to income, household composition, and the incidence and depth of poverty. It also investigates how these patterns of well-being differ between population groups and across space and how they have evolved over time.



Chapter 3 also consists of three sections and investigates employment, income security for older persons, and aged care as key policy areas. Thus, Chapter 3 does not aim to be a comprehensive treatment of possible policy implications of aging in Malaysia, but focuses on selected key areas of high policy interest and on closing critical knowledge gaps. Section 3.1 aims to build an understanding of the current labor market environment for older workers in Malaysia. This will be the basis for actionable policy recommendations to extend productive working lives. For this purpose, it investigates recent trends in the employment of older workers including with regard to labor market participation patterns by gender, ethnicity, urban-rural location, and education. In addition, the section elaborates on the types of jobs that older workers hold and patterns with regard to earnings at any particular age and across workers' entire careers. Section 3.2 evaluates the performance of Malaysia's system of contributory and non-contributory social protection programs to achieve adequacy, coverage, and affordability of old-age income protections. It builds on and extends the relevant analysis in the Malaysia Economic Monitor *Surviving the Storm* (see World Bank 2020) by covering relevant institutions beyond the EPF, evaluating the performance of social assistance programs implemented by the Department of Social Welfare (*Jabatan Kebajikan Masyarakat* or JKM) specifically for older persons, and providing a more extensive discussion of considerations and options for a non-contributory "social pension." Section 3.3 reviews aged care policies, laws and programs, and discusses crucial areas such as aged care provision and financing, quality assurance and human resources, as well as the governance of private for-profit and not-for-profit providers. The section documents that aging, accompanied by changing socioeconomic circumstances and expectations of older persons, is expected to increase the demand for a variety of aged care services and to pose a significant challenge to existing aged care arrangements in Malaysia.

Chapter 4 uses the documentation of the context and investigations of policy key areas to develop a set of actionable policy recommendations. The policy recommendations recognize that the promotion of productive and inclusive aging will require a comprehensive, interagency policy approach that addresses challenges and constraints in a systematic and mutually reinforcing way, as well as an approach that adopts a

life cycle perspective and mainstreams interventions to address specific constraints that women face. Based on this recognition, Chapter 4 argues that fostering the productive employment of all workers, including older workers, will be crucial for mitigating the growth impacts of aging and addressing persistent talent shortages. In addition, improvements in the income security of older persons will require an integrated vision of a system for old-age income protection with policy measures in the areas of both social insurance and social assistance. With regard to social insurance, proactive measures can improve the coverage and adequacy of relevant schemes. However, even with all these measures it is unlikely that social insurance schemes can ever reach full coverage of the labor force. Thus, a modest, broadly targeted tax-financed social pension may also be required. Finally, for the aged care sector to become a new driver of economic growth, it will be crucially important to create an enabling market and regulatory environment for private not-for-profit aged care provision, to strengthen the governance of the sector, and to strategically and selectively increase public financing in line with available fiscal space.

The report relies on a mixed-methods approach to investigate the factors that constrain the achievement of productive and inclusive aging and to develop actionable policy recommendations.

The mixed-methods approach combines quantitative, qualitative and institutional research. The quantitative research is conducted using recent, nationally representative data from the Household Income and Expenditure Survey and the Labour Force Survey, both of which are conducted by the Department of Statistics Malaysia. In addition, international data sources (the World Bank's World Development Indicators and the United Nations' Population Prospects, for example) are used to compare Malaysia with other countries. Complementing the quantitative investigation, qualitative and institutional analyses are used to improve the understanding of the constraints behind the most significant challenges identified by quantitative data, in particular in the area of aged care where significant knowledge gaps exist. The qualitative analysis employs semi-structured interviews with diverse stakeholders to answer three related questions. *First*, what are views on the roles and responsibilities of older persons, families, communities, non-governmental organizations (NGOs), the private sector, and the Government in providing and financing aged care? *Second*, what are the views of family caregivers and care workers with regard to their skills, remuneration, working conditions, quality of services, and Government support? *Third*, what are the experiences, preferences, ideas, concerns, and expectations of older persons with regard to aged care?⁴ Finally, the institutional analysis encompasses a desk review of relevant laws and regulations in areas such as employment, pensions and aged care.

The report recognizes that while aging is a long-term process, the policy challenges it raises are deeply intertwined with and exacerbated by short- and medium-term phenomena such as the COVID-19 pandemic.

The year 2020 not only marks a crucial milestone in Malaysia's development trajectory because it becomes an aging country, but also because it is the year during which the COVID-19 pandemic presents arguably the greatest economic, health and social challenges in the country's history. As discussed in this report, the increased rates of unemployment and underemployment due to the COVID-19 pandemic lend urgency to the policies that allow the productive and inclusive employment of older workers, including with regard to the provision of enhanced and tailored opportunities for lifelong learning. In addition, the COVID-19 pandemic may increase the vulnerability of older persons while reducing their savings for retirement through declining EPF contribution rates, withdrawals from EPF accounts, and declines in asset prices. In fact, reduced contribution rates to and early withdrawal modalities from EPF accounts formed an important part of Malaysia's response to COVID-19. Finally, COVID-19 infections in several aged care homes in Malaysia demonstrate the importance of service standards, in particular health and safety standards, to protect older persons living in institutional settings as an exceptionally vulnerable population group.

⁴ For the precise methodological approach of the qualitative analysis, see Annex B. The complete sets of findings and implications from the qualitative analyses are documented in a background paper to this report by French (2020).



CHAPTER 2

Context

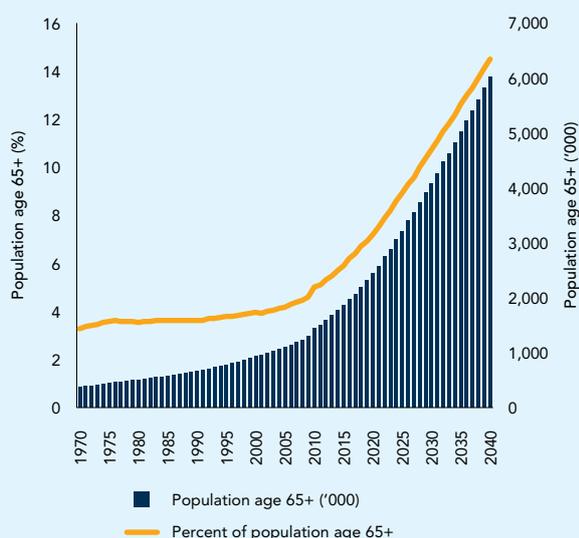
2.1 Demographic Context

Nationwide Demographic Trends

Malaysia becomes an aging society in 2020, according to projections by both the Department of Statistics Malaysia (DOSM) and the United Nations World Population Prospects (UN WPP).⁵ An aging society is defined as a society with 7 percent or more of the population age 65 and above. Thus, following a recent uptick in the pace of demographic change the year 2020 marks an important demographic milestone for Malaysia. For much of Malaysia's developmental history since its formation in 1963, the country was demographically "young"—less than 4 percent of the population was age 65 and above until twenty years ago (see Figure 2.1). In the past, the pace of demographic change was also relatively slow. It took Malaysia 36 years for the proportion of older persons to increase by just one percentage point from 3.3 percent in 1970 to 4.3 percent in 2006. However, around the year 2010, the pace of aging began to accelerate. As a result, it took just six years from 2006 to 2012 for the proportion of older persons to increase by a further one percentage point to reach 5.3 percent. Based on current projections, the proportion of older persons will increase by more than another percentage point to 8.2 percent in 2023, which is only three years away.

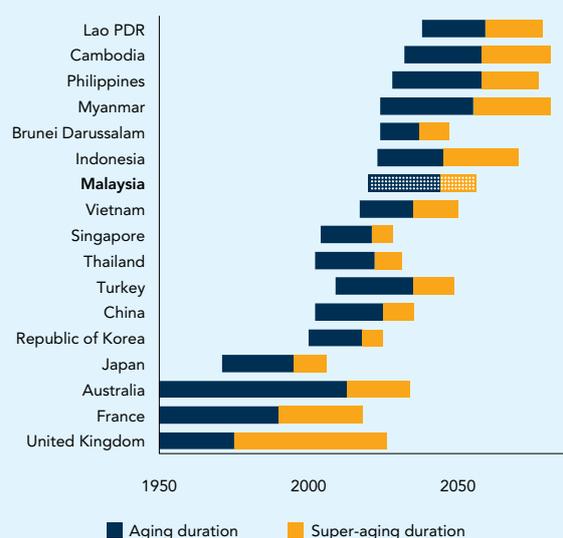
The pace of aging in Malaysia is nearly identical to Japan's. Among countries in the Association of Southeast Asian Nations (ASEAN), Thailand, Singapore, and Vietnam became aging nations ahead of Malaysia, and all ASEAN countries except Lao PDR and Cambodia will make this transition by 2030. The

FIGURE 2.1: Population age 65 and above, Percentage and Number ('000)



Source: Authors' calculations based on DOSM.

FIGURE 2.2: Transition from aging to aged, and super-aged status by country, Years



Source: Authors' calculations based on UN WPP.

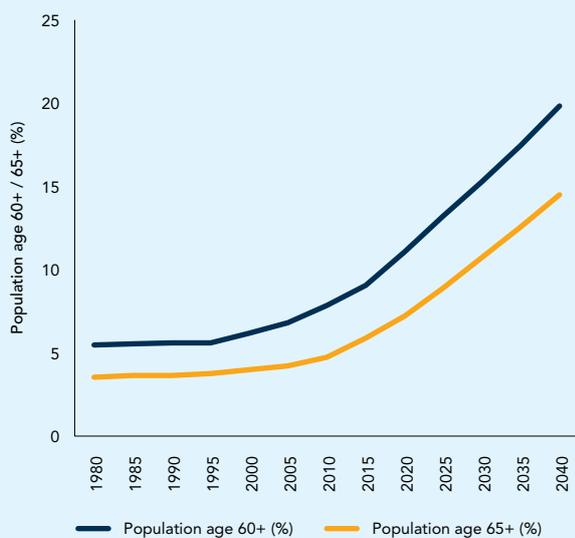
Note: Data for Australia, France and United Kingdom are truncated as these were aging societies even before 1950. Blue bars represent the transition period from aging to aged. Orange bars represent the transition period from aged to super-aged.

⁵ Unless otherwise stated, demographic projections are based on the medium fertility projection variant of the UN WPP's 2019 Revision. This variant incorporates information on net international migration including flows of labor migrants, irregular migrants, and refugees (see United Nations 2019).

pace of aging in Malaysia is so rapid that in the 24 years from 2020 to 2044, Malaysia is projected to reach the next demographic milestone—that of an aged nation (more than 14 percent of the population age 65 and over). This same transition, from aging to aged nation, took 115 years in France, 69 years in the United States (see Kinsella and He 2009), and 24 years in Japan. Japan’s and Malaysia’s subsequent transition from aged to super-aged (more than 20 percent of the population age 65 and over) is projected to take 11 and 12 years, respectively, and thus to follow a remarkably similar pace. It is worth noting that while Japan underwent its demographic transition at a similar pace to Malaysia, it did so at a more advanced stage of economic development and that several East Asian countries will make the same transition even more rapidly than Malaysia (for instance China, the Republic of Korea, Singapore, Thailand and Vietnam, see Figure 2.2). Nevertheless, the magnitude of the demographic challenge faced by Malaysia should not be underestimated. Projections indicate a net increase per year of between 130,000 to 210,000 older persons between 2020 and 2044. As a result, the number of older persons will reach 5.6 million by 2044.

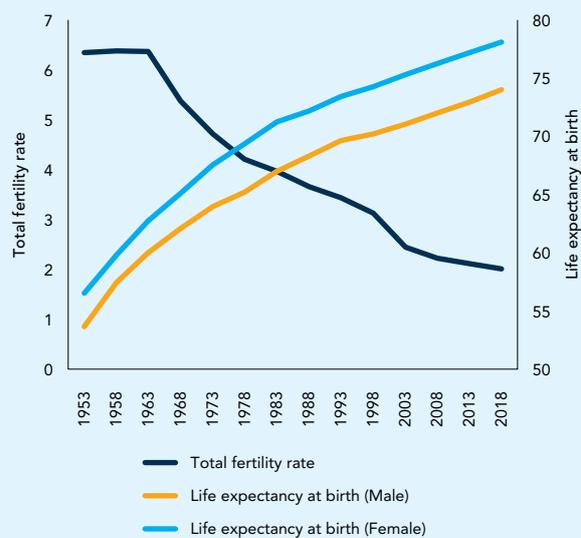
Malaysia’s overall aging narrative remains unchanged irrespective of how aging is measured and of the precise cutoff to differentiate between older and non-older persons. This report recognizes potential shortcomings of relying on chronological age to measure individual and population aging processes and therefore, in Box 2.1, complements this concept with newer measures of aging—prospective age and characteristics-based measures. Nevertheless, the report generally uses chronological age to measure individual and population aging and relies on age 65 as the cutoff to define older persons, in alignment with international norms and age categories published by DOSM. While the cutoff of 65 makes it possible to contextualize the current state and pace of Malaysia’s demographics across countries, it is worth noting that policymakers in Malaysia often use 60 as the cutoff to differentiate between older and non-older persons and define an “aging society” as one with 15 percent or more of the population age 60 and above, a threshold expected to be reached in 2030. What is most important is that the aging narrative remains unchanged irrespective of cutoff age used (see Figure 2.3).

FIGURE 2.3: Population age 60 and above and 65 and above, Percentage



Source: Authors’ calculations based on DOSM.

FIGURE 2.4: Total fertility rate and male and female life expectancy at birth, Percentage and Years



Source: Authors’ calculations based on UN WPP.



Malaysia's rapid pace of aging has been driven by a precipitous decline in the total fertility rate accompanied by a sustained rise in life expectancy, especially for women. Malaysia's total fertility rate (that is, the average number of children born to a woman over her lifetime) for the period from 1960 to 1964 was 6.4, but the fertility rate dropped to the replacement level of 2.1 in the period from 2010 to 2015. At two, it is now below the replacement rate (see Figure 2.4). In parallel, life expectancy at birth has increased by more than two decades since the 1950s. The increase in female life expectancy has been particularly impressive. It now stands at 78 years, four years longer than males.

Although life expectancy has increased, not all of the increased years of life are spent in good health or free of disabilities, underscoring the importance of healthy aging over the life cycle. Malaysia's healthy life expectancy at birth is estimated at 66.6 years in 2016, about a decade less than life expectancy, according to the WHO Global Health Observatory. This divergence is partly due to the fact that the prevalence of NCDs is high and rising. For example, the prevalence of diabetes among adults increased from 11.2 percent in 2011 to 18.3 percent in 2019, according to the National Health and Morbidity Survey 2019. The prevalence of diabetes also rises with age—among those age 60 and above, 41.5 percent have diabetes, whether diagnosed or not. NCDs frequently lead to complications such as strokes which in turn can result in disability and dependence (also see Section 3.3). Unsurprisingly and perhaps due to other contributing factors such as a lack of nutrition, literacy or education, the prevalence of IADLs limitations among those age 60 and above is high (42.9 percent in 2018, according to the National Health and Morbidity Survey 2018). Adjusting for the prevalence of disabilities, Malaysia's old-age dependency ratio already seems to be close to that of France (see Box 2.1).

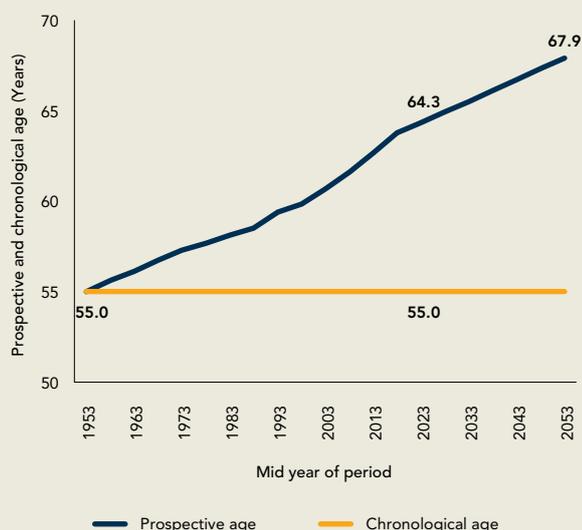
BOX 2.1

Measuring Aging

Chronological age is the most common and straightforward but not always the best measurement of aging, as it looks backward rather than forward. Sanderson and Scherbov (2019) introduce prospective age as an alternative, forward-looking measure—persons with the same prospective age, across different periods of time, have the same expected remaining life expectancy (RLE). Figure 2.5 uses an RLE duration of 18 years to calculate prospective age trends for Malaysia.⁶ This is because 18 years was the RLE of a person age 55 in the early 1950s, around the time of the EPF Act of 1951 was passed. The figure shows that a person age 55 in 1953 would have been expected to live another 18 years—as would a person age 64 in 2023 and a person age 68 in 2053. By contrast, chronological age at 55 remains unchanged over time. Prospective age can further be used to measure aging dynamically, using the population’s life expectancy to adjust the age structure and relevant parameters such as the old-age dependency ratio. In effect, this measure “corrects” chronological age by taking into consideration life expectancy and its relevance to economic, labor, and pension policies.

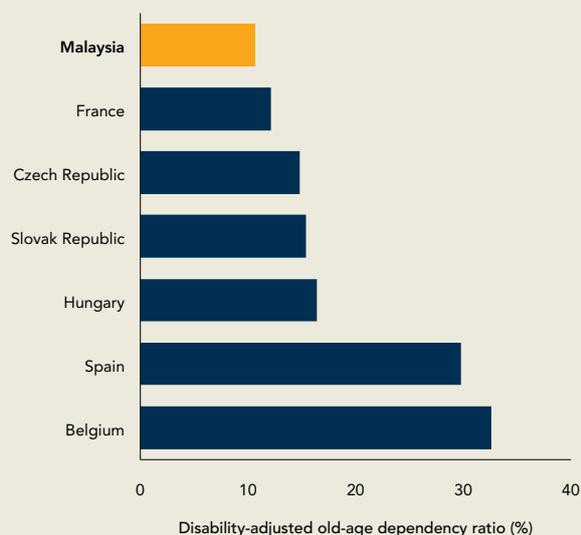


⁶ Many countries use an RLE duration of 15 years to compare prospective age, reflecting labor and pensions parameters at the point that social security systems for older persons were introduced in many high-income countries.

FIGURE 2.5: Prospective and chronological age, Years

Source: Authors' calculations based on UN WPP.

Note: Prospective age—where RLE is fixed to the RLE of a 'standard' year/period. 1950–1955 is the period used here.

FIGURE 2.6: Disability-adjusted old-age dependency ratio, Percentage⁷

Sources: Authors' calculations based on UN WPP, National Health and Morbidity Survey 2018 and Bussolo et al 2015.

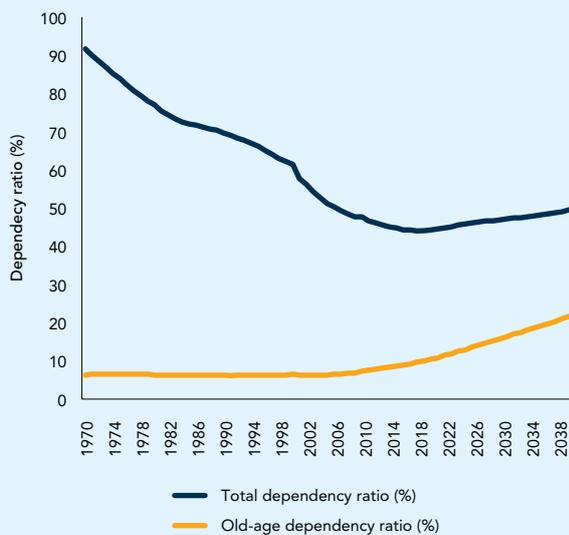
Characteristics-based measures of aging, as a generalization of prospective age, uses characteristics of aging to define a person's age, as older persons are a very heterogeneous group with a diverse range of functional capacities (WHO 2015). Characteristics-based measures of aging adjust the old-age dependency ratios—defined as the number of persons over the age of 65, compared with the working-age population age 15 to 64—by disabilities which characterize old age rather than by chronological age. Thus, characteristics-based measures highlight that aging not only pertains to the end of life but to the whole life cycle. Although it may not always be possible to compare different countries using characteristics-based measures of aging due to differences in survey instruments and the environment (more or less enabling for those with disabilities), Malaysia's disability-adjusted old-age dependency ratio of 10.6 percent already seems to be close to that of France, which stands at 12.1 percent (see Figure 2.6). This reinforces the criticality of extending disability-free lifespans through strengthened public health care and emphasizing health promotion and risk factor reduction for persons of all ages.

There are other concepts and measures of aging, such as biological age (see Skirbekk 2019). The concept of biological age relies on a set of biomarkers to measure aging more precisely than chronological age which disregards aspects such as economic productivity, health, or functional capacities. While the concept of biological age is intuitively appealing, its application has proven technically challenging.

⁷ Note: Full comparability between Malaysia and other countries may be affected as different survey instruments are used. The disability-adjusted old-age dependency ratio is defined as the number of adults who are at least 20 years of age and who have disabilities or dependencies in IADLs, divided by the number of adults who are at least 20 years of age and who do not have disabilities.

From a demographic perspective, Malaysia’s best years are now. As Malaysia transitions from a relatively young to an aging nation, it is currently in a demographic sweet spot. The total dependency ratio—the number of persons age 0 to 14 and over the age of 65, compared with the working-age population of 15 to 64—stands at 44 percent. This is at the lowest it has been since at least 1970 (see Figure 2.7). This is due to a rapid decline in the young-age dependency ratio—the ratio of individuals age 14 or below compared to the working-age population—as fertility rates have dropped, as well as a previously moderate increase in the old-age dependency ratio—the proportion of individuals age 65 and above. However, after this period, the total dependency ratio will rise again. This is driven by both an increase in the absolute number of older persons, as well as a decrease in the relative, but not necessarily absolute, number of persons of working age. Accordingly, the proportion of the working-age population is projected to decrease by 3 percentage points—from 69 percent of the population in 2020 to 66 percent in 2050—(see Figure 2.8) even though the working-age population is projected to increase by 4.4 million over the same time period. This increase in the total dependency ratio has critical implications for economic growth. As the burden of caring for the young and older persons falls on fewer and fewer working-age adults, the growth of Malaysia’s economy will have to be driven by productivity growth and the expansion of economically productive years, not the increasing share of the working-age population (see Section 2.2).

FIGURE 2.7: Total and old-age dependency ratios, Percentage



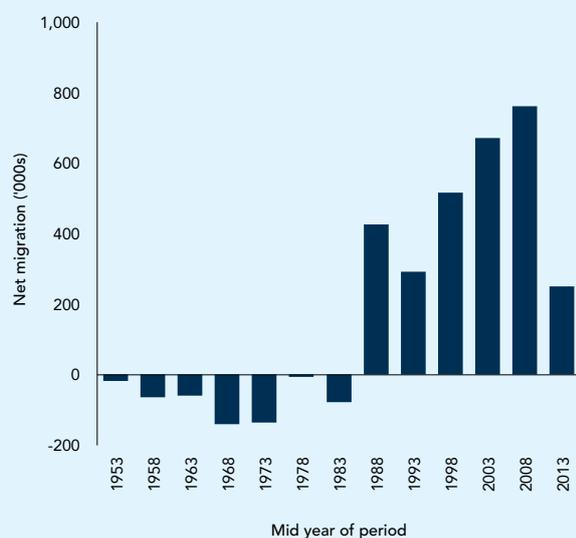
Source: UN WPP.

FIGURE 2.8: Change in working-age population from 2020 to 2050, Percentage

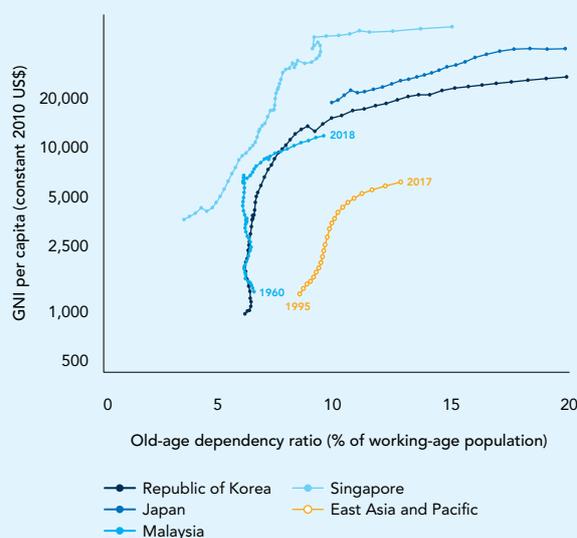


Source: Authors’ calculations based on UN WPP.

Net inward migration of working-age adults into Malaysia since the 1980s has moderated the pace of aging and created more favorable demographics—for now. Over 90 percent of noncitizens in Malaysia in 2020 are of working age. Hence, the net inward migration of 3 million persons since the 1980s has helped to moderate the pace of aging in Malaysia (see Figure 2.9). In fact, if noncitizens were excluded from the calculation of the total dependency ratio, this would amount to 50 percent in 2020. In other words, two working age adults would on average need to support one dependent, young or old. However, if noncitizens are included in calculations, the total dependency ratio is 44 percent, that is, more than two working age adults support one dependent. If there were henceforth no more inflows of working-age noncitizens into Malaysia, this would result in less favorable demographics.

FIGURE 2.9: Net migration, Numbers ('000)

Source: Authors' calculations based on UN WPP.

FIGURE 2.10: GNI per capita and old-age dependency ratio, 2010 US\$ and Percentage

Source: Authors' calculations based on World Bank World Development Indicators.

Malaysia has not grown old before it has grown rich to the extent of other countries in East Asia and the Pacific—but the window for further demographics-driven economic growth is closing rapidly.

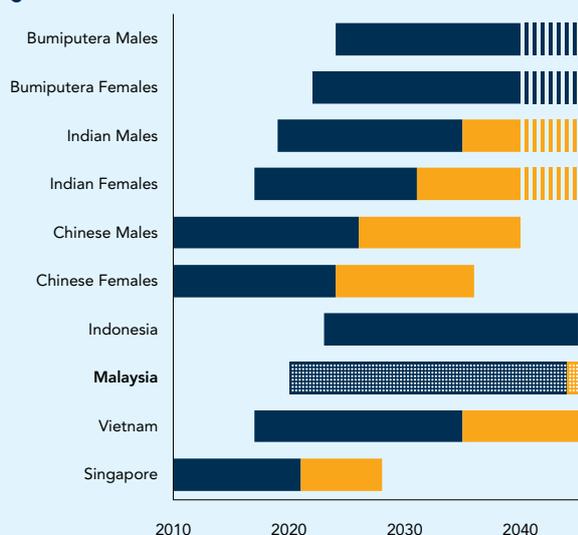
Compared with the East Asia and Pacific region as a whole, Malaysia's level of economic development has been above average for any given old-age dependency ratio. For instance, at an old-age dependency ratio of 10 percent, the typical country in East Asia and Pacific had a gross national income (GNI) per capita of US\$5,000 while Malaysia's GNI per capita was US\$10,000. However, while Malaysia underwent rapid economic development during the period when its old-age dependency ratio was low, the subsequent rise in the old-age dependency ratio means that the window for further demographics-driven economic growth is closing quickly, which makes immediate action an imperative. Put differently, GNI per capita increased steadily during the period from 1960 to 2000 when the old-age dependency ratio was just over 6 percent but has recently inflected towards a lower economic growth trajectory, with relatively smaller increases in GNI per capita for any given increase in the old-age dependency ratio. In addition, while Malaysia has not "grown old before it has grown rich," it is also not on a growth trajectory required to catch up with high-income countries in East Asia and Pacific such as Japan, Singapore, and the Republic of Korea (see Figure 2.10).

Subnational Demographic Trends

Aging patterns within Malaysia exhibit pronounced heterogeneities—for instance, there is more than a decade of difference between the stage of aging across ethnicities. Malaysia's Chinese community was already an aging society with 7 percent or more persons age 65 and above by 2010 while the Bumiputera community, encompassing Malays and other indigenous peoples, is projected to become an aging society only in 2023, which is 13 years later (see Figure 2.11). These differences reflect a smaller fall in the total fertility rate among the Bumiputera community to 2.8 by 2010, compared with the fall in fertility rate among Chinese to 1.8 that same year (see Zarinah Mahari 2011). The Indian community reached the threshold of

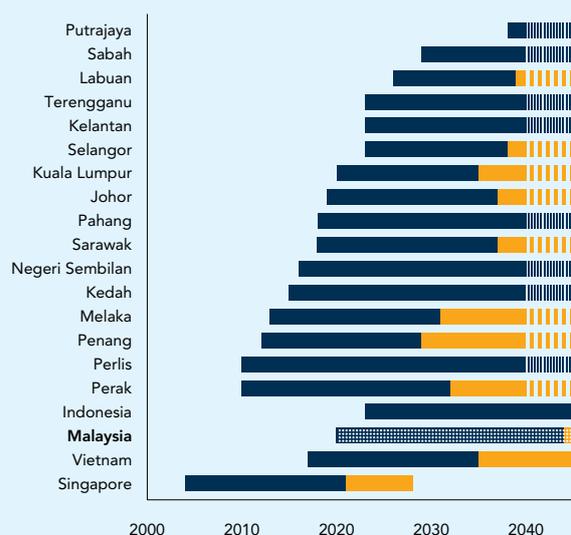
an aging society in 2018. Across ethnicities, women in general are at a more advanced stage of aging than men, by approximately two years. The combined interethnic and gender differences in the aging process are so large that, for example, Chinese women, as a community, will become aged around the same time that Bumiputera men become aging.

FIGURE 2.11: Transition from aging to aged, and aged to super-aged status by ethnicity and gender, Years



Source: Authors' calculations based on DOSM and UN WPP.
 Note: Data for Chinese men and women are truncated as these were aging population groups even before 2010. Blue bars represent the transition period from aging to aged, orange bars the transition period from aged to super-aged.

FIGURE 2.12: Transition from aging to aged, and aged to super-aged status by state, Years



Source: Authors' calculations based on DOSM and UN WPP.
 Note: Data for Perlis and Perak are truncated as these were aging societies even before 2010. Blue bars represent the transition period from aging to aged, orange bars the transition period from aged to super-aged.

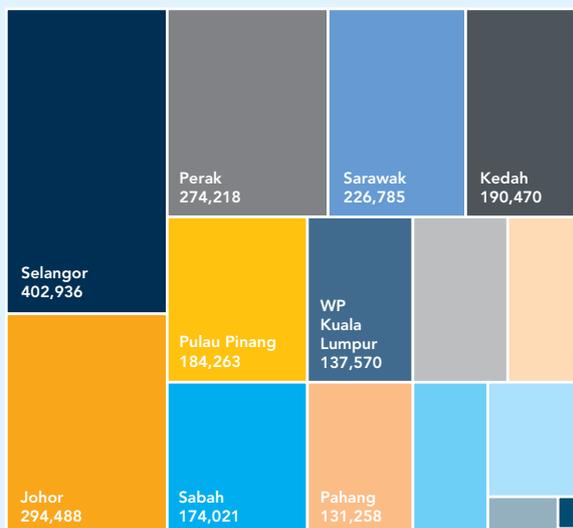
There are large geographic differences; up to two decades separate the stage of aging across states.

Two states—Perlis and Perak—had already become aging societies by 2010 while in the same year, only 2.9 and 5.5 percent of residents in Sabah and Kelantan were age 65 or older, respectively. This means the demographic profile of Perlis and Perak is more comparable to that of Singapore than to those of some other states, while Sabah and Kelantan are more demographically comparable to Indonesia (see Figure 2.12). Perhaps unsurprisingly, Sabah is only projected to become an aging society in 2029, approximately two decades after Perlis and Perak.⁸ In addition to the stage of aging, the pace of aging also varies substantially across states. For instance, relative to the rest of the country, Selangor is younger and has a larger proportion of working-age adults. As a consequence, Selangor is only projected to become an aging society in 2023, three years after Malaysia as a whole.⁹ However, the pace of aging in Selangor is projected to be so rapid that the state will transition to an aged society after only 15 years. Thus, it is projected to become an aged society in 2038, six years before Malaysia as a whole.

Selangor currently accounts for the largest number of older persons in Malaysia, followed by Johor, but Sabah and Sarawak are catching up rapidly (see Figure 2.13 and Figure 2.14). Selangor, Johor and Perak—three relatively well-off states—have the largest number of older persons currently, while Sarawak and Sabah in East Malaysia come fourth and seventh, respectively. Until 2040, differential demographic changes are projected to result in a quadrupling of the number of older persons from 174,000 to 627,000

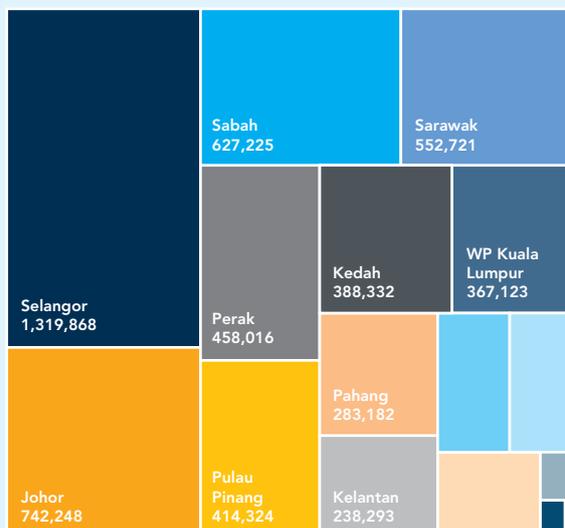
8 The literature has also documented wide variations in proportion of older persons below the level of the state, that is, at the district and sub-district level (see Hamid 2019).
 9 Internal net migration projections are based on a transition probability matrix for the period 2000 to 2010 (see DOSM 2016).

FIGURE 2.13: Population age 65 and above by state, 2020, Persons



Source: Authors' calculations based on DOSM.
 Note: National population aged 65 and above = 2.4 million.

FIGURE 2.14: Population age 65 and above by state, 2040, Persons



Source: Authors' calculations based on DOSM.
 Note: National population aged 65 and above = 6.0 million.

in Sabah, one of Malaysia's poorer states. This will cause it to leapfrog to become the state with the third highest number of older persons. In parallel, Sarawak will become the state with the fourth highest number of older persons. More broadly, unequal demographic trajectories superimposed on unequal economic development across states is an aspect of Malaysia's aging journey which will need to be addressed. Several states such as Kedah, Perlis, Pahang, and Perak are already both relatively poorer and older than Malaysia as a whole. In addition, Sabah is relatively poor but is still relatively young for now. Hence, it may have a short window of opportunity left to leverage demographics-driven growth.



2.2 Macroeconomic Impacts

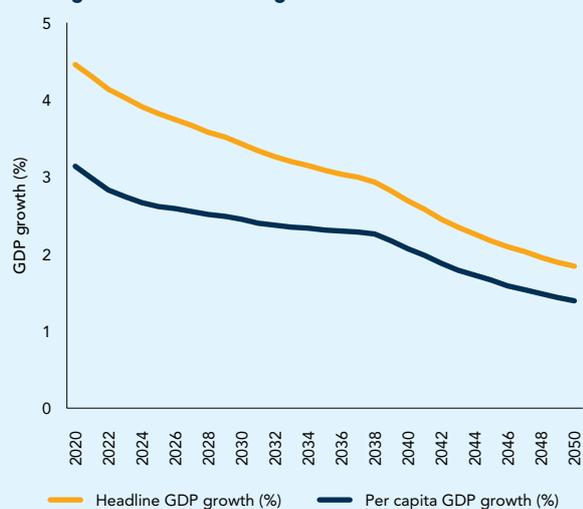
Impacts on Growth

In Malaysia, like several other Asian countries, a demographic dividend contributed up to a third of headline economic growth between the 1960s and the 1990s (see Bloom, Caning and Finlay 2010 and Bloom and Williamson 1998). In several Asian countries, favorable demographics, fueled by the decline in the young-age dependency ratio and resulting rise in the share of the working age to total population ratio, contributed to fast economic growth rates between the 1960s and the 1990s. The contribution to growth of favorable demographics has come to be known as the demographic dividend. As discussed in Section 2.1, Malaysia was one of the countries in East Asia that benefited from these favorable demographics for much of its independent history. However, as also discussed in Section 2.1 Malaysia like many countries in the region now has a population that is aging faster than its level income may suggest, especially compared to many European countries (see World Bank Group 2016).

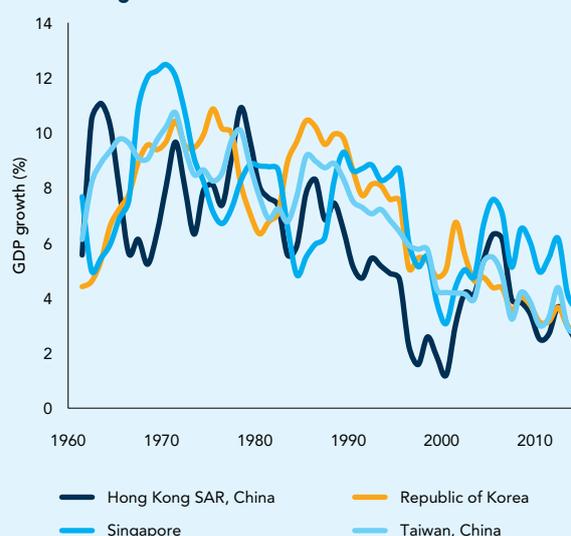
Today, Malaysia has a population that is aging fast, leading to negative long-term growth impacts unless proactive mitigation policies are adopted. One of the most direct impacts of aging is the decline in the share of the working-age population. As detailed in Section 2.1, this is primarily driven by a decline in the fertility rate and a rise in longevity; as the fertility rate falls and a larger portion of the population is age 65 and older, the working-age population as a fraction of the total population shrinks. This implies that to some extent, aging is an integral part of the development process; as countries become richer, fertility rate tends to fall and with access to better health care and nutrition people tend to live longer. However, the process of aging can still be much faster in some countries than in others. For example, Malaysia is aging faster compared to the Republic of Korea at the same level of income. Malaysia's gross national income (GNI) per capita in 2018 was about the same as Korea's GNI per capita in 1991, but in that year the proportion of the population age 65 and over in Korea was 5.5 percent, compared to 6.9 percent in Malaysia (see Section 2.1).

Using the World Bank Long-Term Growth Model (LTGM), it is possible to analyze how changes in the share of the working-age population will impact long-term economic growth in Malaysia. The LTGM is an extension of the Solow-Swan growth model where the key building blocks include saving, investment and productivity. The model is developed and maintained by the Macroeconomics and Growth Team of the World Bank's Development Research Group. See Annex C for details on the model and its calibration to the Malaysian context.

In the baseline scenario, aggregate economic growth in Malaysia is expected to decline from 4.5 percent in 2019 to about 1.8 percent by 2050 (see Figure 2.15). Under an assumption of continuity of recent trends in the economy, headline growth is expected to slow down substantially. Growth in GDP per capita is projected to fall substantially as well, from 3.2 percent in 2019 to 1.5 percent in 2050. This decline in long-term economic growth, as projected in this baseline scenario is not unique to Malaysia, but is typical for economies transitioning to high-income status (see Figure 2.16) which Malaysia is expected to achieve by 2024 based on the same baseline projection. The projected decline in growth can be attributed to a fall in the following five growth drivers: (i) population growth, (ii) growth in the ratio of persons in working age to the overall population, (iii) total factor productivity (TFP) growth, (iv) human capital growth, and (v) effectiveness of public and private investment.

FIGURE 2.15: Projected headline and per capita GDP growth, Percentage

Source: Authors' calculations based on LTGM.

FIGURE 2.16: Headline GDP growth by economy, Percentage

Source: Authors' calculations based on World Bank World Development Indicators.

Through alternative scenarios it is possible to isolate the long-term contribution of demographic changes to the projected decline in Malaysia's economic growth. In the LTGM, demographic changes are captured by population growth and the growth of the working-age to total population ratio. Both of these growth drivers are projected to decline under the baseline scenario. However, this baseline scenario ignores potential countervailing developmental or policy changes such as the potential for further increases in female labor participation (see Lee and Chung 2008, Canning et al. 2009 and World Bank 2020). By sticking to the baseline assumption that aging will cause a decline in the labor force, two alternative scenarios in which the growth rate of the population and the working-age to total population ratio are constant can be used to reveal an approximation of the long-term growth impact of aging. These alternative scenarios assume that all the other variables continue on the same path as assumed under the baseline projections, which of course might not necessarily be the case if there are interaction effects between aging and variables that countervail the negative impacts of aging on growth (see Bloom et al. 2016).

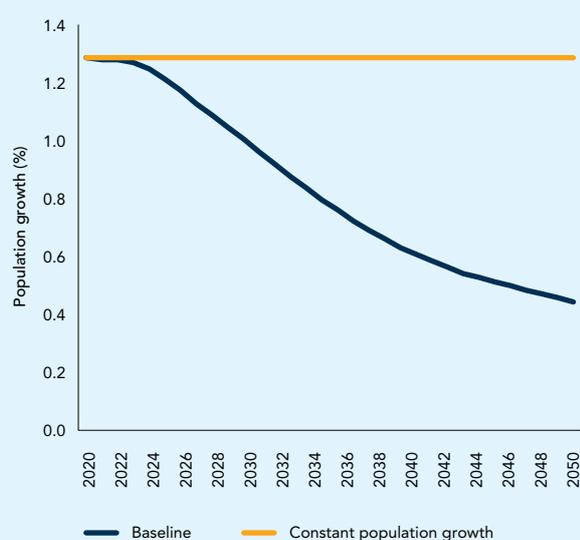
All else being equal, demographic changes are projected to account for about a third of the decline in GDP growth between 2020 and 2050. Projections using the LTGM show that the decline in population growth accounts for about 19 percent of the slowdown in headline growth, while the decline in the growth rate of working-age to total population ratio accounts for 12 percent (see Table 2.1). This means that, altogether, demographic changes are projected to account for 31 percent of the decline in GDP growth between 2020 and 2050. It also means that in an alternative scenario where both population growth and the growth rate of working-age to total population ratio were to remain constant at their 2020 level until 2050, the long run GDP growth rate would be 1.1 percent higher (2.9 percent instead of 1.8 percent in 2050). Figure 2.17 and Figure 2.18 show that under the assumption that the population growth rate remains constant at 1.3 percent per year, headline GDP growth will still decline from 2020 to 2050, but only to 2.5 percent instead of 1.8 percent. Similarly, Figure 2.19 and Figure 2.20 show that under the assumption that the ratio of persons in working age to the overall population will remain unchanged, headline GDP growth of 2.3 percent will be achieved in 2050.

TABLE 2.1: Projected headline GDP growth and drivers of growth

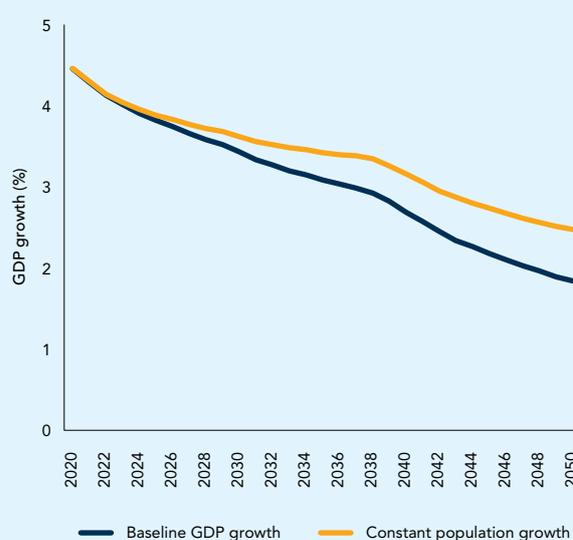
Variables	Contribution (%)	Share (%)
Population growth	-0.63	19
Growth in ratio of persons in working age to the overall population	-0.41	12
TFP growth	-0.39	12
Human capital growth	-0.07	2
Public Investment (falling effectiveness)	-1.43	43
Private capital to output ratio (falling effectiveness)	-0.40	12
Baseline	-2.60	100

Source: Authors' calculations based on LTGM.

Certain structural changes in the economy are likely to limit the impacts of aging on growth. In many countries the female labor force participation has risen concurrently with a decline in fertility rate (see Canning et al. 2009). This has been documented for the Republic of Korea (see Lee and Chung 2008), as well as for Australia, Canada, and the United States (see Brown and Guttman 2017). The female labor force participation rate has also been rising in Malaysia, though the World Bank (2019b) ascribes this more to the expansion of pre-school education and other policy choices, rather than to the country's declining fertility rate. Another variable that might not remain constant is human capital. In fact, this is expected to increase further as the average educational attainment in Malaysia continues to rise (see World Bank 2016). Finally, an increase in savings due to a larger share of the population living longer could lead to a rise in private investment (see below). If any of these interaction effects come to pass, the negative impact of aging on Malaysia's long-term economic growth prospects will likely be less than projected in Table 2.1.

FIGURE 2.17: Baseline and alternative projections for population growth rate, Percentage

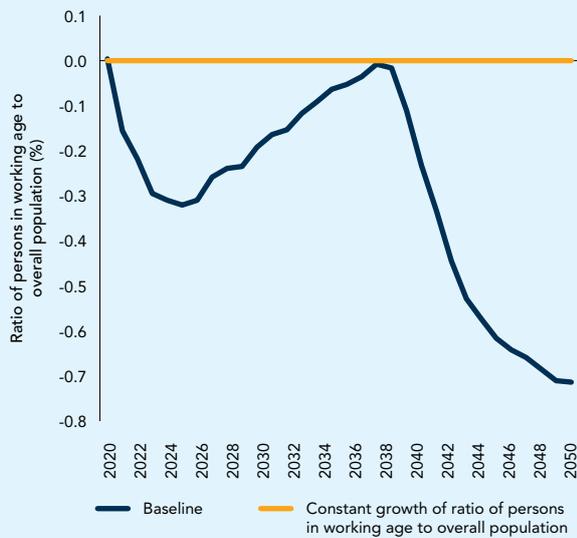
Source: Authors' calculations based on UN WPP.

FIGURE 2.18: Baseline and alternative projections for headline GDP growth, Percentage

Source: Authors' calculations based on LTGM.

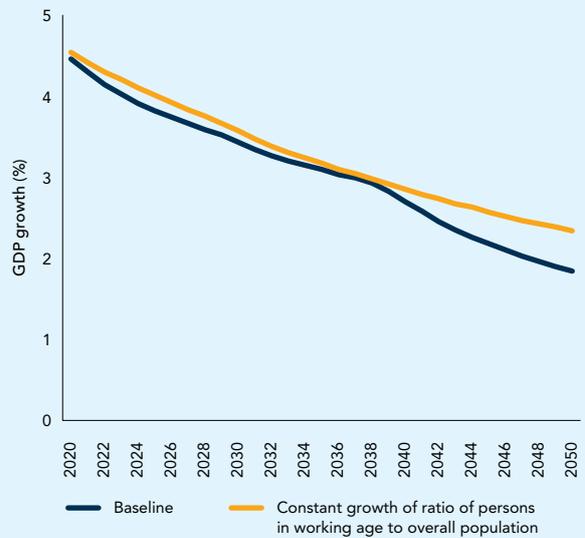


FIGURE 2.19: Baseline and alternative projections for ratio of persons in working age to overall population, Percentage



Source: Authors' calculations based on UN WPP.

FIGURE 2.20: Baseline and alternative projections for headline GDP growth, Percentage

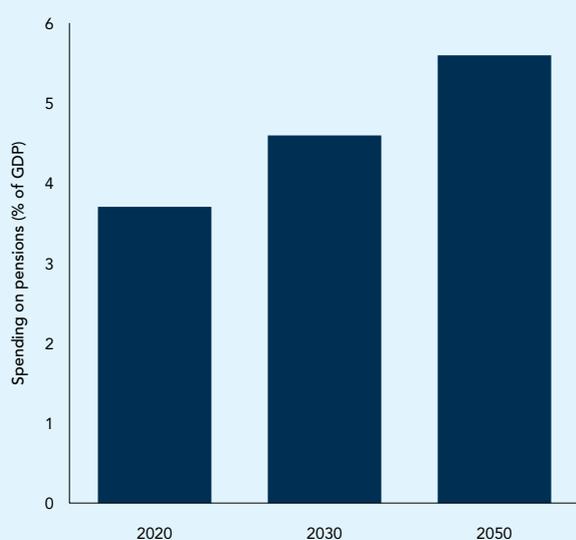


Source: Authors' calculations based on LTGM.

Impacts on Public and Private Savings

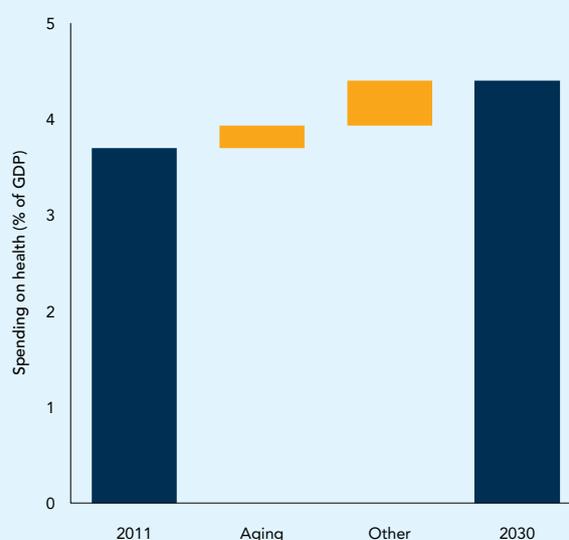
The fiscal effects of aging will likely be consequential for Malaysia. There is little doubt that aging will put more pressure on the already limited fiscal space in Malaysia, on both the revenue and expenditure sides. On the revenue side, a shrinking working-age population and lower economic growth rate will lead to a narrower tax base. This has particularly stark implications for Malaysia given that the country already collects less revenue (as a share of GDP) than many comparator economies. On the expenditure side, the reliance on a defined-contribution provident fund places Malaysia in a relatively unusual situation in which—outside of the civil service pension system—institutions providing old-age income security pose no fiscal risks. Nevertheless, an aging population will necessitate accelerated spending on health care, aged care and civil service pensions. According to projections by the International Monetary Fund (IMF), pension spending in Malaysia will rise to 4.6 percent of GDP by 2030 and to 5.6 percent by 2050 (see IMF 2010 and Figure 2.21). Moreover, Rannan-Eliya et al. (2013) estimate that aging will account for up to one-third of Malaysia’s expected increase in health care-related spending between 2010 and 2030 (see Figure 2.22). In addition to that, aging will likely require higher spending on tax-financed social assistance for older persons (see Section 3.2) and aged care (see Section 3.3), though in both cases from a very low base.

FIGURE 2.21: Projected spending on pension, Percentage of GDP



Source: IMF (2010).

FIGURE 2.22: Projected health spending, Percentage of GDP



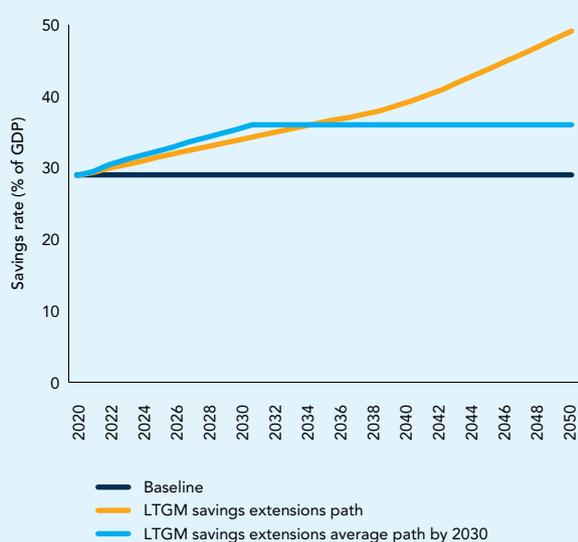
Source: Authors’ calculations based on Rannan-Eliya et al. (2013).

With a shrinking tax base and rising public expenditures related to aging, the fiscal deficit is likely to widen leading to higher long-term debt. In 2020, the COVID-19 pandemic is putting pressure on an already limited fiscal space (see World Bank 2020), and this pressure will likely be further reinforced by aging. Moreover, many of the policy interventions required to mitigate the negative impacts of aging on economic growth, such as raising the quality of education, would require not only better spending but also more outlays of public funds. This does not mean that these policy interventions are not worth pursuing—on the contrary. But it does mean that without proactive policy efforts on the revenue, as well as on the expenditure side, public debt is likely to rise with aging making the debt sustainability objective more and more difficult to achieve.

In contrast to public savings, aging will likely lead to a rise in private savings. Theoretically, the effects of aging on private savings are not straightforward because aging increases some drivers of savings and lowers others. On the one hand, aging may lead to a decline in aggregate saving because a smaller fraction of the population is earning wages (compositional effect). On the other hand, because of longevity people start to save more for the future, which may lead to a rise in saving (behavioral effect). As such, the dynamics of saving is then dependent on the comparative size of the composition and behavioral effects. Empirically, there is compelling evidence from various countries in East Asia to suggest the behavioral effect is larger than the compositional effect (see Schult 2004, Kinugasa and Mason 2007, Li, Zhang and Zhang 2007 and World Bank 2013). Thus, empirically there is a clear positive association between aging and private savings.

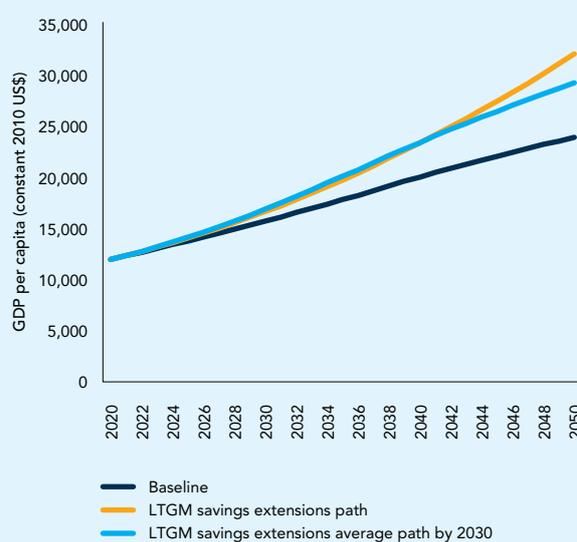
Long-term simulations of the dynamics of savings in Malaysia confirm that aging will likely be associated with higher private saving. Using estimated coefficients of the determinants of savings from Abdullah and Ahmad Khan (2010) and following an approach that is methodologically similar to Hevia and Loayza (2013), an extension of the LTGM can be used to simulate long-term aggregate savings rates for Malaysia. The simulations show that aging is projected to lead to a higher long-term national savings rate in Malaysia, which in turn boosts investment and thus long-term growth and real GDP per capita (see Figure 2.23 and Figure 2.24). The actual simulated path of the long-term savings rate rises above 50 percent of GDP by 2050 (“LTGM Savings Extensions Path”). Given that such an outcome appears unlikely, an alternative scenario considers the average path until 2030 and keeps the savings rate constant thereafter (“LTGM Savings Extensions Average Path by 2030”). This alternative scenario still leads to higher headline economic growth than in the baseline simulations.

FIGURE 2.23: Baseline and alternative projections for savings rates, Percentage of GDP



Source: Authors' calculations based on LTGM.

FIGURE 2.24: Baseline and alternative projections for GDP per capita, 2010 US\$



Source: Authors' calculations based on LTGM.

The projection that aging will lead to an increase in savings is consistent with recent studies on the effects of aging on long-term interest rate and monetary policy. Recent studies that document the impact of population aging on monetary policy and its transmission through the economy show that aging most likely leads to a decline in real interest rates (see Eggertson, Mehrotra and Robbins 2019 and

Carvalho, Ferrero and Nechio 2016). This typically implies a lower natural rate of interest (NRI).¹⁰ In fact, Bielecki, Brzoza-Brzezina and Kolasa (2018) show that aging in the euro area—that is, in the monetary union of 19 member states of the European Union—will likely drive down the NRI from 4 percent to 0.4 percent by 2030. The increase in savings due to aging leads to an increase in the supply of loanable funds and thus a lower interest rate. This has monetary policy implications: A lower NRI in any given country would mean less room for the central bank to lower the policy rate, which is usually done to boost employment and nudge inflation toward its target. This suggests that population aging is likely to create challenges for monetary policy makers in the future.

2.3 Socioeconomic Context

With Malaysia's transition to an aging society in 2020, it is vital to address its rapid pace of aging in order to support continued economic growth and enhance social protection. To support an appropriate policy response, there is a need for in-depth understanding about the economic activities and poverty incidence among older persons. It is also necessary to understand how their well-being differs from that of non-older persons in Malaysia, with further disaggregation based on individual and household characteristics including age group, gender, and geographical location. Based on such evidence, policymakers can make short-term and long-term decisions to protect all layers of society based on specific needs and capabilities. This section examines the economic well-being of older Malaysians in terms of employment, income, and poverty, as well as considers the average income (including pensions and social assistance) needed by older persons to fulfill their basic needs and maintain a decent standard of living post-retirement.

Household Composition and Income

Co-residence between older and non-older persons remains common in Malaysia; as of 2016, only 19 percent of households with at least one older person had no younger members in the household. For older persons, co-residing can be beneficial as it makes it easier to pool resources, thus reducing the likelihood of falling into poverty. Co-residence also facilitates childcare or aged care while larger households, including older persons co-residing with younger persons, can reduce expenditure per capita by sharing communal resources such as housing and utilities. In this report, co-residence refers to older persons living with at least one working-age adult age 15 to 64. Around 23 percent of all households in Malaysia have at least one older person, and of these, 80 percent have at least one older person and at least one working-age adult. In comparison, about 9 percent of older-person households consist of one older person only, and approximately 10 percent have two or more older persons in the same household but no persons below the age of 65. Households comprising older persons and children age 14 or below but no working-age adults are rare (see Table 2.2).

Approximately 56 percent of households with older persons are headed by a working-age adult.¹¹ Of the 44 percent of households with older persons that are headed by older persons, a little less than one-half (18.9 percent of all households with older persons) have no household members who are not

¹⁰ The NRI is defined as the interest rate at full employment, which drives the conduct of monetary policy: the policy rate is set below the NRI to incentivize spending and investment and raise employment/output and inflation and vice-versa. A lower NRI increases the probability of hitting the Zero Lower Bound, leading to liquidity trap and rendering monetary traditional policy tools ineffective.

¹¹ In the Household Income and Expenditure Survey, the household head is defined as any household members considered as the head of household by other members. The head of household must be an income recipient and age 15 years and over.

older persons (see Table 2.3). An almost equal number of households headed by older persons contain older persons and working-age adults but no children. A much smaller number of households headed by older persons (5.8 percent of all households that include older persons) are three-generation households that contain older persons, working-age persons, and children. The large majority of three-generation households are headed by a working-age adult.

TABLE 2.2: Composition of households with at least one older person, Percentage

Household type	One older person	Two older persons	Three or more older persons	Total
Older persons and working-age adults	38.7	10.6	0.3	49.6
Older persons, children, and working-age adults	23.6	7.0	0.1	30.7
Older persons only	8.7	9.9	0.2	18.9
Older persons and children	0.3	0.4	0.0	0.7
Total	71.3	28.0	0.7	100.0

Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

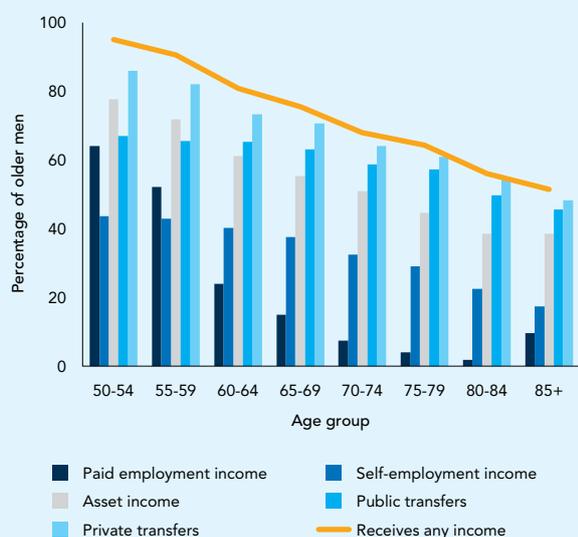
TABLE 2.3: Composition of households with at least one older person by age of household head, Percentage

Household type	Non-older person head	Older-person head	Total
Older persons and working-age adult	31.5	18.1	49.6
Older persons, children, and working-age adult	25.0	5.8	30.7
Older persons only	0	18.9	18.9
Older persons and children	0	0.7	0.7
Total	56.5	43.5	100.0

Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

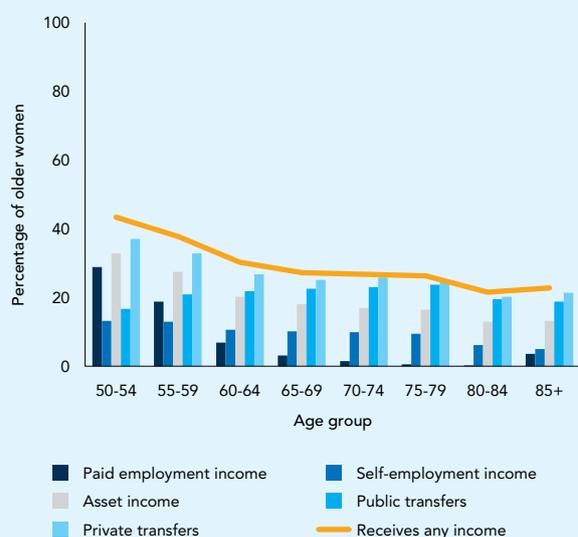
Income receipt rapidly declines around age 60, especially with regard to income from economic activities such as paid work and self-employment. Figure 2.25 and Figure 2.26 show that the proportion of older men and women who receive income from paid employment or self-employment begins to drop rapidly around age 60. Compared with those age 55 to 59, the proportion of men age 60 to 64 with paid employment income is 28.4 percentage points lower. The proportion of men with paid employment income further declines from 15 percent to 1.8 percent between age 65 to 69 and 80 to 84, while in parallel, the percentage of men with self-employment income declines from 37.6 percent to 22.5 percent. This is consistent with the higher rates of poverty found among the oldest age groups (see Figure 2.34 and Figure 2.35 below). For older women, the patterns of decline are less pronounced due to the lower proportion of women with paid employment and self-employment incomes across all age groups. Despite the significant

FIGURE 2.25: Older men receiving income by income source and age group, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
 Note: Asset income includes interest, dividends, and net proceeds from the rental of land or buildings. It does not include imputed rent for owner-occupied housing.

FIGURE 2.26: Older women receiving income by income source and age group, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
 Note: Asset income includes interest, dividends, and net proceeds from the rental of land or buildings. It does not include imputed rent for owner-occupied housing.

increase in the overall female labor force participation rate, from 46.8 percent in 2010 to 55.2 percent in 2018, female labor force participation remains low when compared to 80.4 percent of working-age men (see World Bank 2019b).

For both genders and for all age groups from 50 to 54 and beyond, asset income and transfer income are more common than paid employment or self-employment income and the receipt of these income types also declines slower with age.¹² The receipt of private transfer income declines more rapidly than public transfers. This may be because of older persons moving in with younger family members in their later years, and thus any financial support provided by the younger members is no longer counted as a private interhousehold transfer. A similar mechanism may be at work with public transfers, as the younger family member may be recorded as the official recipient of public transfers that benefit the entire co-resident household. Finally, it is noteworthy that by age 70 to 74 approximately one-third of men and three-fourths of women have no sources of income at all (see Section 3.1 for more details on the employment and earnings pattern of older persons and Section 3.2 for a discussion of income security of older persons).

¹² In this analysis, asset income comprises income received as returns to assets owned, including interest received on bank deposits and loans, dividends related to investment in company shares or unit trusts, income from rental of land or buildings, or royalties received. It excludes imputed rent for owner-occupied housing, which may be interpreted as the in-kind return on investment from purchasing the home and is conventionally included in measures of gross household income. Transfer income encompasses both private transfers (transfers made between households or between charities and households) and public transfers (transfers made between the Government and households), and transfers both within Malaysia and between Malaysia and another country.

Incidence and Depth of Poverty

Using the B20 per capita income threshold as the poverty line, in 2016 the poverty rate was 21 percent for households with older persons and 19.7 percent for households without older persons (see Table 2.4). To investigate poverty among older persons, it is useful to consider both households that include older persons and households that are headed by older persons. For this report, the poverty lines are set at the annual pre-transfer per capita income thresholds for the bottom 20 percent (B20) and the bottom 40 percent (B40) of the population.¹³ Based on the B20 poverty line, older persons and people living in households with them are slightly more likely to be poor (with a poverty rate of 21 percent) than those in households that do not have members age 65 years or above (poverty rate of 19.7 percent). The difference in poverty rates between households with older persons and households without older persons is slightly larger when using the B40 per capita income threshold, at 42.3 percent and 39.3 percent, respectively. Higher poverty rates for households with older persons are attributable in part to the lower household income per capita associated with the rapid decrease in the share of persons receiving any income beyond age 60.

TABLE 2.4: Poverty rates for those living in households with and without older persons, Percentage

Household type	B20 poverty line	B40 poverty line
No older persons present	19.7	39.3
Older persons present	21.0	42.3
All households	20.0	40.0

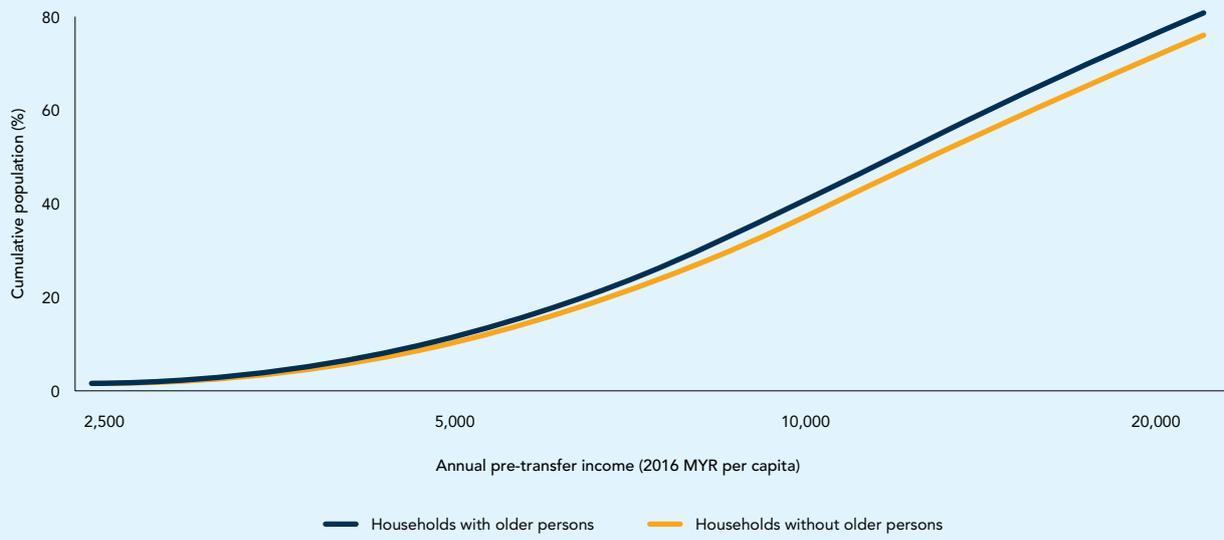
Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
Note: Differences in the poverty rates are statistically significant at the 99-percent confidence level.

The poverty incidence curves in Figure 2.27 show that households with older persons have higher poverty incidence regardless of the specific choice of poverty line. This is evident from the fact that the poverty incidence curve for households with older persons is consistently above that for households without older persons. The figure also shows that the difference in poverty rates—measured by the vertical distance between the two curves—is relatively small, ranging from nearly zero for very low poverty lines to about 3 percentage points at a high poverty line of RM10,000 per capita per year (equivalent to RM3,333 per month for a family of four). Thus, the finding that households with older persons are slightly more likely to be poor is robust to the choice of the poverty line. The shape of the poverty incidence curve also implies that there is a sizable number of households with older persons who have incomes that are just slightly above any given poverty line and therefore vulnerable to falling into poverty.

Households that are headed by older persons have slightly higher poverty rates than households headed by non-older persons (see Table 2.5). Based on the B20 per capita income threshold, 21.7 percent of persons living in households headed by older persons are poor compared to 19.9 percent of those in households headed by non-older persons. Using the B40 per capita income threshold as the poverty line,

¹³ The focus on pre-transfer per capita income is relatively unusual for Malaysia but follows the approach suggested in *The State of Social Safety Nets 2018* (see World Bank 2018) and the B40 poverty line in World Bank (2020). It is also worth noting that Malaysia's poverty line income (PLI) based on the 2005 methodology is not used because it is so low that almost no one is poor by that definition. Therefore, differences in poverty rates are practically non-existent, giving little guidance for policy. It is not possible to apply the newer 2019 PLI methodology because details for calculating household-specific PLIs are not yet available.

FIGURE 2.27: Poverty incidence curves for households with and without older persons



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).



TABLE 2.5: Poverty rates for households headed by older and non-older persons, Percentage

Household type	B20 poverty line	B40 poverty line
Head non-older person	19.9	39.8
Head older persons	21.7	43.3
All households	20.0	40.0

Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
 Note: Differences in the poverty rates are statistically significant at the 99-percent confidence level.

the poverty rates are 43.3 percent for households headed by older persons and 39.8 percent for others. Poverty rates for households headed by older persons are also marginally higher than the poverty rate for all households with older persons. This means that households headed by older persons are slightly more likely to be in the B20 or B40 than households with older persons that are headed by non-older persons.

Among households with an older person, poverty is more strongly associated with the presence of children in the household than with that of older persons. Households composed of only older persons and households comprising older persons co-residing with working-age adults but no children have below-average poverty rates of about 12 percent at the B20 poverty line and 30 percent at the B40 poverty line (see Table 2.6). In contrast, poverty rates are much higher among three-generation households (comprising older persons, working-age adults and children). For these households, poverty rates are almost three times higher at the B20 poverty line and almost double at the B40 line.¹⁴ This is most likely attributable to many older persons bringing in at least some income that helps support the household's needs, as opposed to children who generally do not earn any income at all. It could also be an indication that being in a three-generation household—which is becoming less common in Malaysia but still accounts for almost one in three households with older persons (see Box 2.2)—could be an indicator of economic stress.¹⁵

TABLE 2.6: Poverty rates by household composition, Percentage

Household type	B20 poverty line	B40 poverty line
Older persons and working-age adult	11.7	29.6
Older persons, children, and working-age adult	30.6	55.5
Older persons only	11.6	29.9
Older persons and children	33.1	56.9
Total	21.0	42.3

Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

14 Poverty rates are also elevated among households composed of only older persons and children. This household configuration is relatively rare, accounting for less than 1 percent of households with older persons (see Table 2.4).

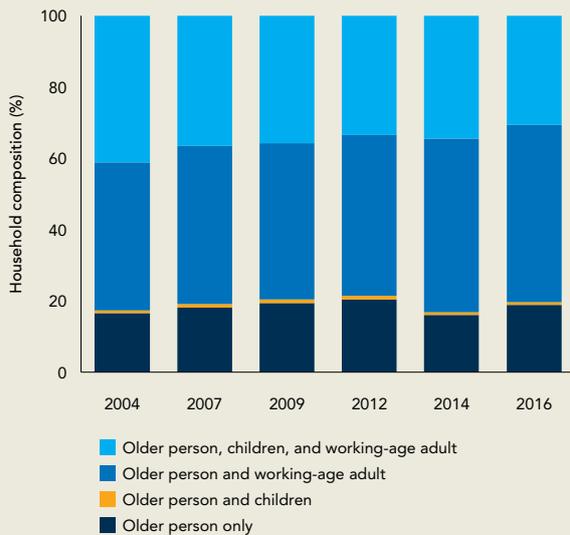
15 The pattern that poverty in Malaysia is associated with the presence of children in the household is also confirmed by cross country comparisons using the OECD relative poverty approach that sets the poverty line at 50 percent of national median income and three age groups, children age up to 17 years, working-age adults age 18-65 years, and older persons age 66 and above). These comparisons show that in Malaysia, the relative poverty rate among older persons is slightly higher than that of working-age adults, but relatively low compared to child poverty rates. Furthermore, the poverty rate among older persons is lower in Malaysia than in most upper middle- or high-income comparator countries.

BOX 2.2

Trends in co-residence, living arrangements and poverty among older persons

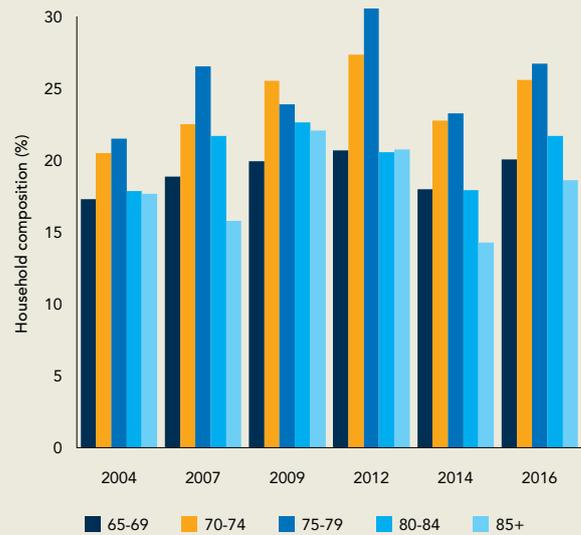
Patterns in living arrangements among older persons have changed gradually yet distinctly during the last decade. Figure 2.28 shows that this is most evident among households in which older persons co-reside with working-age adults. Among households that include an older person, the share of three-generation households declined from 41.1 percent in 2004 to 30.7 percent in 2016. This was mostly offset by an increase in the share of households comprising only older persons and working-age adults but no children, which increased from 41.5 percent to 49.6 percent over the same period. This is likely due to younger working-age people staying in school longer and starting their own families at a later age. In addition, there was a smaller but still significant increase in the percentage of households composed of only older persons, from 16.4 percent to 18.9 percent of all households with older persons.

FIGURE 2.28: Household composition among households with at least one older person, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2004–2016 (DOSM).

FIGURE 2.29: Older persons living in households with only older persons by age group, Percentage

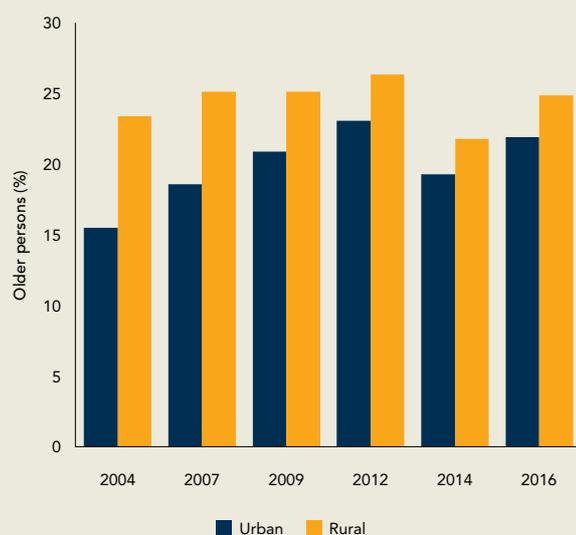


Source: Authors' calculations based on Household Income and Basic Amenities Survey 2004–2016 (DOSM).

The prevalence of older persons living alone or only with other older persons is highest for those in their 70s.

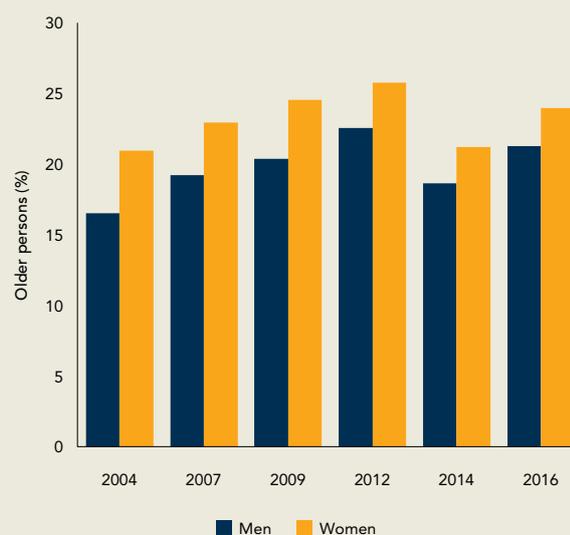
Approximately one in four older persons age 75 to 79 live in households composed solely of older persons, a rate that has increased slightly since 2004 (see Figure 2.29). Households comprising only older persons are slightly less common for those age 65 to 69, most likely because many of them live with spouses who are younger than 65. For those age 80 and older, the lower prevalence of older person-only households most likely occurs because of declining income with age and the limited availability of care for older persons in Malaysia. Digging deeper, Figure 2.30 shows that older persons in rural areas are more likely to live in households of only older people than those in urban areas. In rural areas, the percentage of older persons in households with only older persons has stayed fairly constant between 23 percent to 26 percent from 2004 to 2016. In contrast, the rate in urban areas has increased from 15 percent to 22 percent over the same period. This most likely reflects both increasing urbanization and ability for older urban dwellers to live on their own in urban areas rather than living with their children or moving back to the *kampung* they may have left at a younger age. It may also be due in part to a shrinking pool of working-age persons residing in rural areas as more of them move to urban areas for work. Looking at gender differences, older women are slightly more likely than older men to live in households composed of only older persons, with the prevalence increasing gradually over time for both women and men (see Figure 2.31). One reason for this gender difference is women's greater longevity.

FIGURE 2.30: Older persons living in households with only older persons by location, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2004–2016 (DOSM).

FIGURE 2.31: Older persons living in households with only older persons by gender, Percentage



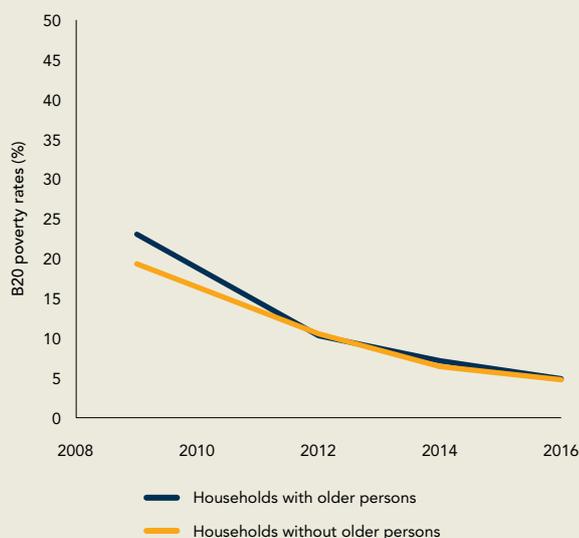
Source: Authors' calculations based on Household Income and Basic Amenities Survey 2004–2016 (DOSM).

BOX 2.2 (continued)



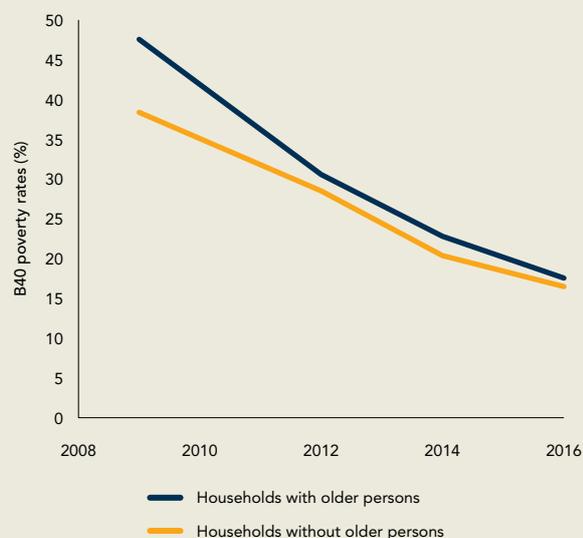
Also during the last decade, overall poverty rates have declined rapidly and even more so for households that include older persons. Figure 2.32 and Figure 2.33 compare poverty trends from 2009 to 2016 between households with older persons and those without. In this case, the poverty lines are set at the B20 and B40 thresholds for pre-transfer income per capita in 2009 and “anchored” in real terms, and therefore act as absolute poverty lines that are adjusted only for inflation, not for income growth. In 2009, poverty rates were significantly higher among households with older persons—by 3.8 percentage points at the B20 poverty line and 9.2 percentage points at the B40 line. Since then, the incidence of poverty has fallen significantly for both types of households, but particularly so for households with older persons for which it dropped from 23.1 to 4.8 percent according to the “anchored” B20 poverty line and from 57.6 to 17.6 percent per the “anchored” B40 line. As a consequence, the difference in poverty rates across household types also narrowed considerably.

FIGURE 2.32: B20 poverty rates among households with and without older persons, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2009–2016 (DOSM).

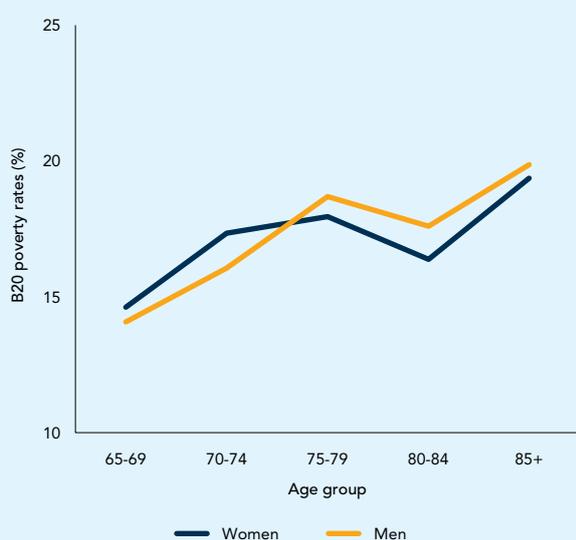
FIGURE 2.33: B40 poverty rates among households with and without older persons, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2009–2016 (DOSM).

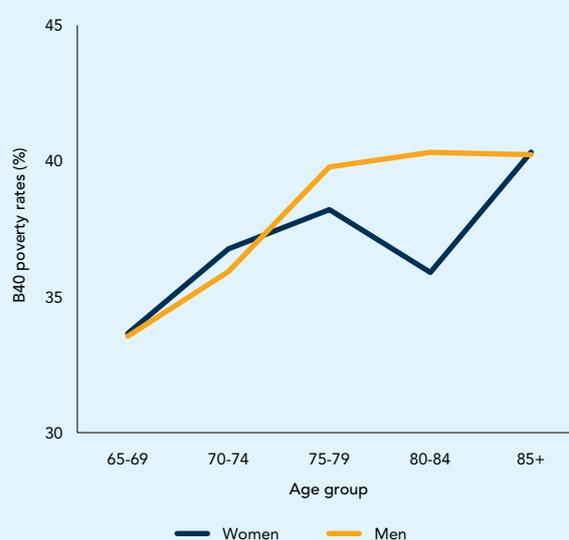
The poverty incidence for older persons rises with age. The higher poverty rates among persons at a more advanced age can be explained by decreasing income with age, as older persons become less involved in paid work and self-employment and have increasing dependence on asset income and public or private transfers. However, this is mitigated to some degree by the fact that most older persons live with a working-age adult and therefore their poverty status depends more on the incomes of the working-age members than on their own incomes. Based on the B20 income threshold, 14 percent of men and women between age 65 and 69 are poor, with the poverty rate rising to 19 to 20 percent by age 85 (see Figure 2.34). When using the B40 income threshold, poverty rates increase with age, from 34 percent for men and women age 65 to 69 to 40 percent among those age 85 or older (see Figure 2.35). The marginally higher poverty rates among men age 75 to 85 years could be attributable to a greater absolute and relative decline in male labor force participation. It bears noting that up until age 85, the poverty rates for older persons are lower than the rates for the overall population.

FIGURE 2.34: B20 poverty rates among older persons by age group and gender, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

FIGURE 2.35: B40 poverty rates among older persons by age group and gender, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

Further disaggregation of households headed by older persons by urban-rural location and ethnicity shows higher rates of poverty among rural households as well as among the Bumiputera.

Based on the B20 income threshold, 14.3 percent of those in households headed by older persons in urban areas are poor as compared to 34.1 percent in rural areas (see Table 2.7). Using the B40 income threshold, the difference is even more pronounced; in urban areas, 33.6 percent of households headed by older persons live in poverty, as compared to 59.9 among those in rural areas.¹⁶ In addition, Table 2.8 shows that 29.2 percent of those in households headed by an older Bumiputera person are poor according to the B20 income threshold, compared to 7.1 percent of Chinese and 13.9 percent of Indians.¹⁷

¹⁶ Because the B20 and B40 poverty lines used in this analysis are not adjusted for urban/rural price differences, these estimates underestimate urban poverty and overestimate rural poverty by an unknown extent.

¹⁷ See Section 3.2 for a comprehensive discussion of the challenges of and policy recommendations to improve income security for older persons of all backgrounds in Malaysia.

The average poverty gap is about the same between households with and without older persons.

While poverty rates express the percentages of persons or households living below a specified poverty line, poverty gaps combine information about the incidence of poverty (what percentage of the population is poor) with information about the depth of poverty (on average, how far below the poverty line are the poor). Poverty incidence is slightly higher among households with older persons (see Table 2.4 above). In addition, Table 2.9 shows that the poverty gap index is also slightly higher in households with older persons. This is largely because of the higher incidence of poverty—that is, because a higher proportion of households with older persons are below the poverty line—not because they are further below the poverty line than households without an older person.

TABLE 2.7: Poverty rates for households headed by older persons by location, Percentage

Location	B20 poverty line	B40 poverty line
Urban	14.3	33.6
Rural	34.1	59.9
All households	20.0	40.0

Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

TABLE 2.8: Poverty rates for households headed by older persons by ethnicity, Percentage

Ethnic group	B20 poverty line	B40 poverty line
Bumiputera	29.2	54.1
Chinese	7.1	22.2
Indian	13.9	34.5
Others	36.0	58.7
Total	21.7	23.3

Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

TABLE 2.9: Poverty gaps for households with and without older persons, Percentage

Household type	B20 poverty line	B40 poverty line
No older persons present	5.9	14.3
Older persons present	6.3	15.2
All households	6.0	14.5

Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
Note: Differences in the poverty gaps are statistically significant at the 95-percent confidence level.



CHAPTER 3

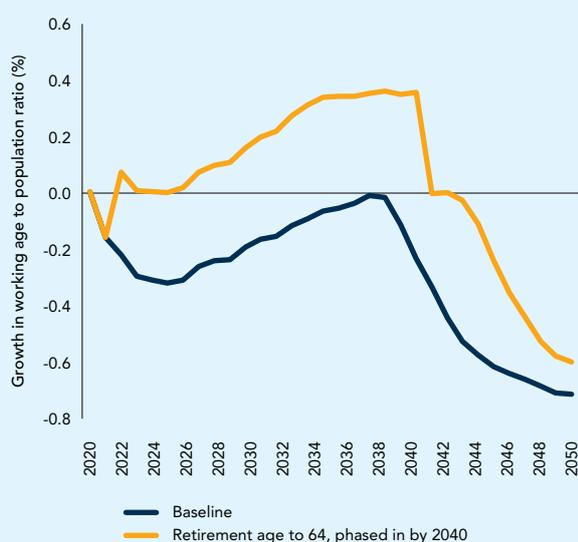
Policy Areas

3.1 Employment

Labor Market Participation

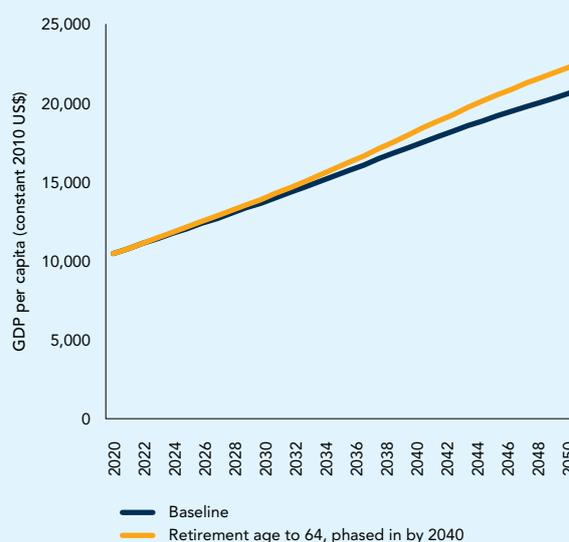
As Malaysians live longer, the right policy environment must be put in place to allow older workers—defined informally as those age 50 and above—to work longer and more productively so that they are able to have sufficient incomes at older ages (see Section 3.2). The better use of the productive potential of older workers can also increase Malaysia’s long-term economic growth. According to the Long-term Growth Model (LTGM) introduced in Section 2.2, gradually raising the minimum retirement age from 60 to 65 by 2040 would increase headline GDP growth by 0.3 percentage points per year. In turn, this would lead to a higher income per capita (US\$22,311 vs. US\$20,658 in 2040 in the baseline scenario). Figure 3.1 and Figure 3.2 depict a scenario where the working-age population gradually changes from 15 to 59 toward 15 to 64 by 2040. This redefinition leads to an increase in the working-age to total population ratio and a considerable boost in its rate of growth, under the assumption that with healthy aging, older workers remain productive and relatively unscathed by disabilities and the complications of NCDs. In this alternative scenario, the ratio of persons of working-age to the overall population stays positive until 2040. Thereafter, growth in this ratio returns to a negative path, but remains slightly higher than in the baseline scenario. As a result, the increase in the minimum retirement age leads to a better use of Malaysia’s productive potential and thus to a modest but sustained boost in the long-term growth path of both headline and per capita GDP.¹⁸

FIGURE 3.1: Baseline and alternative projections for growth in working age to population ratio, Percentage



Source: Authors’ calculations based on LTGM.

FIGURE 3.2: Baseline and alternative projections for GDP per capita, 2010 US\$

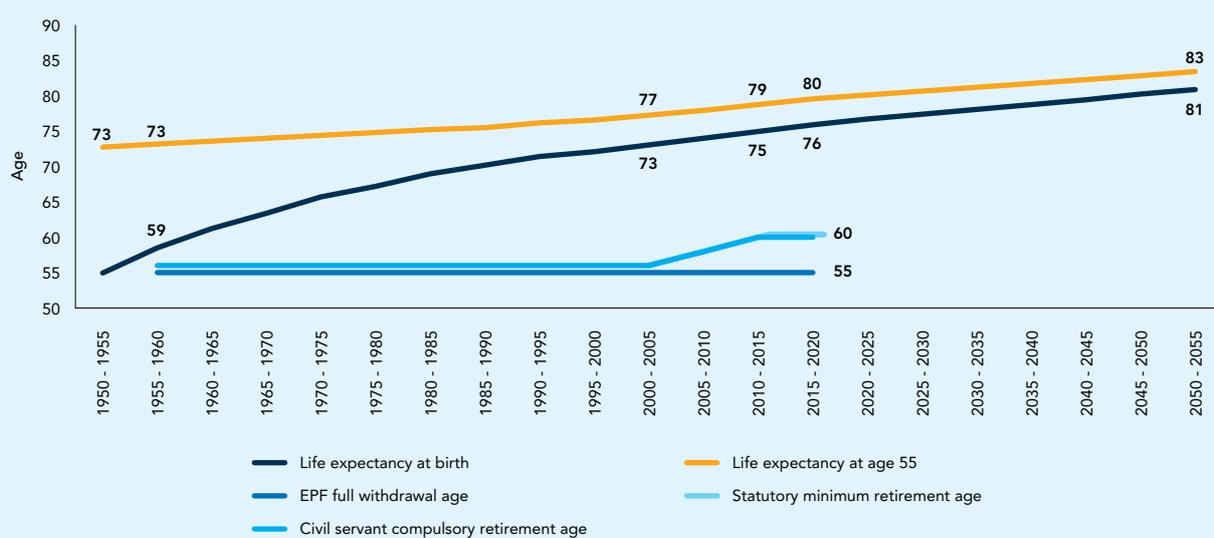


Source: Authors’ calculations based on LTGM.

18 The population data used in this report is split into age cohorts of 5 years each, including from age 59 to 64. Thus, the retirement age policy simulation models an increase in the minimum retirement age from 59 to 64, instead of from 60 to 65. Quantitatively, this does not make a difference since what matters for growth is the rate of the change of the working-age to total population ratio. It is also worth pointing out that in an alternative scenario in which the higher minimum retirement age is phased in by 2025 instead of 2040, the dynamics would be qualitatively similar, but the long-term growth rate would be boosted by about 0.2 percentage points.

Effectively extending productive working lives will require a sound understanding of relevant policy parameters, as well as the patterns of labor force participation, employment, and earnings of older workers. A Malaysian who retires at 55 can expect to live for another 24.6 years. This is the result of a steady increase in life expectancy over the last decades, as well as only very limited changes in relevant policies. Between 1955 to 1960 and 2015 to 2020, life expectancy at birth increased from 58.5 years to 75.9 years. Over the same period, life expectancy at age 55 increased from 73.2 years to 79.6 years. Further extensions in life expectancy are projected for the coming decades. In parallel, the main policy parameters have seen no, or only very gradual, changes. The EPF minimum (full) withdrawal age has been 55 years since the 1950s. The mandatory retirement age for civil servants was gradually increased, but only from 55 to a modest 60, and while a minimum (not mandatory) retirement age for private sector workers was introduced in 2012 this was again set at a very modest level of age 60 (see Figure 3.3). The increased divergence between policy parameters and life expectancy raise questions regarding the income of older persons (discussed in Section 3.2) and their care needs (covered in Section 3.3), as well as the employment and productivity of older workers (discussed in this section). In this context, it is important to note that there is no evidence that increased employment among late-career workers negatively affects the employment prospects of younger workers (see Box 3.1).

FIGURE 3.3: Life expectancy and age-related labor and pensions policy parameters, Years



Source: Authors' calculations based on DOSM, EPF and KWAP.

Compared to other upper middle- and high-income countries, the employment rate of persons age 50 to 74 in Malaysia is relatively low, partly due to low levels of female labor force participation. In Malaysia, the employment rate—calculated as the share of persons employed at a given age—for persons age 50 to 74 stands at 45.9 percent.¹⁹ This rate is higher than Turkey's rate of 34.6 percent, but lower than the rate in most other upper middle- and high-income countries. In fact, it is about 17 percentage points lower than the Republic of Korea's employment rate of that age group, which is 62.9 percent. The

¹⁹ Often, the employment rate is defined as employment as a share of the labor force (which includes all persons who are employed or unemployed but not those not actively looking for work or not available for work). In this report, the employment rate is instead defined as employment as a share of the population overall or within a specific age group.

differences between Malaysia and comparator countries are to a large extent driven by Malaysia’s relatively low employment rates for persons between age 50 and 64, particularly among women (see Table 3.1 and Figure 3.7 below). In fact, the female labor force participation rate in Malaysia is low relative to the male labor force participation rate at all ages, and the country has one of the highest gender gaps in labor force participation compared to its ASEAN peers and other comparator countries (see Figure 3.9 below and World Bank 2019b). This contributes to the low employment rates for persons age 50 and 64. In contrast, for persons beyond age 64, Malaysia’s employment rate is close to the average across comparator countries. Table 3.1 also shows that the 25-year gap between the normal retirement age and the life expectancy at 55 is wider in Malaysia than many other countries. For example, in Germany the gap is about 18 years, in Singapore and the United Kingdom it is about 20 years, and in Japan—which has one of the highest life expectancies in the world—it is about 22 years.

TABLE 3.1: Employment rate of persons age 50 to 74 by country

Country	Employment rate by age group (%)				50-74	Normal retirement age		Life expectancy at age 55	
	50-54	55-64	65-69	70-74		Male	Female	Male	Female
Turkey	50.1	35.3	20.0	12.1	34.6	51.0	48.0	79.4	83.5
Malaysia	66.3	45.2	25.7	17.9	45.9	55.0	55.0	78.5	80.7
United Kingdom	82.0	65.1	21.3	10.8	52.3	65.0	62.7	82.0	84.7
Canada	81.3	62.9	25.3	13.2	53.1	65.0	65.0	82.7	86.0
Australia	79.2	63.8	28.5	13.0	53.2	65.0	65.0	83.6	86.8
Mexico	69.2	55.3	37.6	29.2	53.8	65.0	65.0	78.7	81.5
United States	77.0	63.1	31.9	18.9	54.1	66.0	66.0	80.9	84.3
Singapore	79.3	66.8	26.8		54.4	64.0	64.0	82.9	86.6
Thailand	83.0	67.7	25.2		56.1	55.0	55.0	79.6	83.7
Germany	86.2	71.4	17.0	7.7	57.1	65.5	65.5	81.2	85.1
Chile	74.1	65.6	39.9	26.3	58.4	65.0	65.0	81.2	84.6
Japan	85.4	75.2	46.6	30.2	61.8	65.0	64.0	83.4	88.8
Republic of Korea	77.7	66.8	46.2	34.3	62.9	61.0	61.0	81.9	87.0

Source: Authors’ calculations based on Household Income and Basic Amenities Survey 2016 (DOSM), OECD, ILOSTAT, and UN WPP.

Note: The normal retirement age is defined as the age at which a person with an uninterrupted career starting at age 22 can retire without any reduction in their pension. For Malaysia, the EPF minimum withdrawal age is listed. For Singapore and Thailand, the employment rates for persons 50 and older and 70 and older are listed instead of the employment rates for persons 50 to 74 and 70 to 74.

Arguably, the low employment rate among persons age 50 and above in Malaysia is at least partly due to the relatively low minimum retirement age and EPF minimum withdrawal age. While Malaysia has no statutory retirement age beyond which workers would be prohibited from working, for many employers and employees the minimum retirement age of 60 appears to act as a strong signal. According to a survey conducted by ILMIA in 2018 presented in the National Strategic Development Plan on Ageing Population (ILMIA 2019), 34 percent of persons age 40 and above report that reaching the retirement age would be the

BOX 3.1

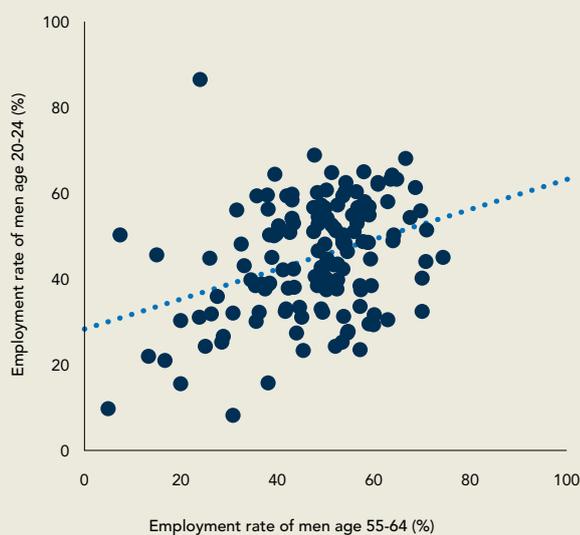
The lump of labor fallacy

The idea that increased labor market participation of older workers will negatively affect the employment prospects of younger people is known as the lump of labor fallacy. While intuitively appealing, there is no solid evidence that increased employment among older workers negatively affects the employment prospects of younger workers—quite the opposite. The lump of labor fallacy is based on the assumption that workers of different ages are substitutes and that there is a fixed number of jobs in an economy. If this was indeed the case, every additional older worker with a job might translate into one fewer younger worker who is employed (see Gruber, Milligan and Wise 2010). The evidence, however, shows otherwise.

Contrary to intuition, studies show that a higher labor market participation of older workers tends to increase that of younger workers. More specifically, the labor market participation of older workers can stimulate the economy, creating higher aggregate demand for labor, including that

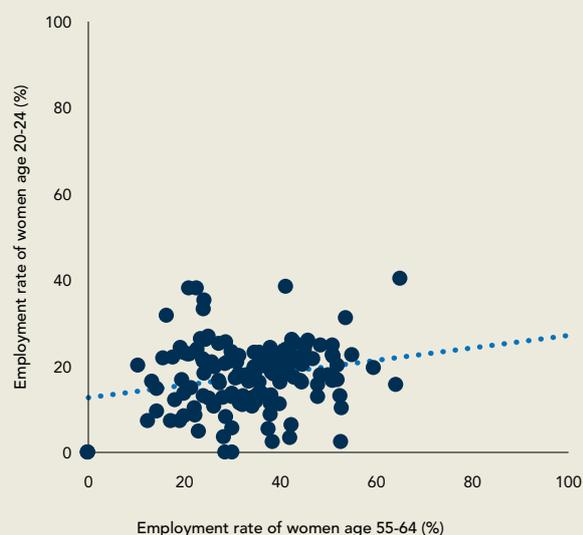


FIGURE 3.4: Employment rates of men age 20-24 and 55-64 by district, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
Note: Agriculture sector workers excluded (see Box 3.3).

FIGURE 3.5: Employment rates of women age 20-24 and 55-64 by district, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
Note: Agriculture sector workers excluded (see Box 3.3).

supplied by younger workers. Further, job types differ between older and younger workers, which means that they are not substitutes but complements (see World Bank 2016). An international analysis of the relationship between the employment rate of persons age 55 to 64 and those age 20 to 24 reveals that in all but one country, increases in the employment of older workers had at worst a neutral association, and in most cases, a positive association with the employment rate of young workers (see Gruber, Milligan and Wise 2010). Several country-specific studies, for instance on China, confirm that a higher employment rate of older workers has no negative impact on the employment prospects of younger workers (see Zhang and Zhao 2012 and Munnell and Wu 2013).

Higher employment rates among older workers are associated with higher employment rates among younger workers in Malaysia, consistent with the lump of labor fallacy. Based on employment rates by district in Malaysia, Figure 3.4 shows a positive correlation between the employment rates of men age 55 to 64 and 20 to 24, with a correlation coefficient of 0.34. Similarly, Figure 3.5 shows a positive correlation between the employment rates of women age 55 to 64 and 20 to 24, albeit with a smaller correlation coefficient of 0.22. This supports the conclusion that increased labor market participation of older workers is not likely to come at the expense of the employment prospects of younger people in Malaysia, for the aforementioned reasons.

primary reason for them to leave the labor force for good. The EPF's minimum withdrawal age of 55 years similarly acts as a signal to retire. In addition, it provides older workers in formal, stable, and relatively well-paying jobs with the means to leave the labor force when they turn 55 (see Section 3.2).

Many countries have increased or are in the process of increasing their normal retirement ages.

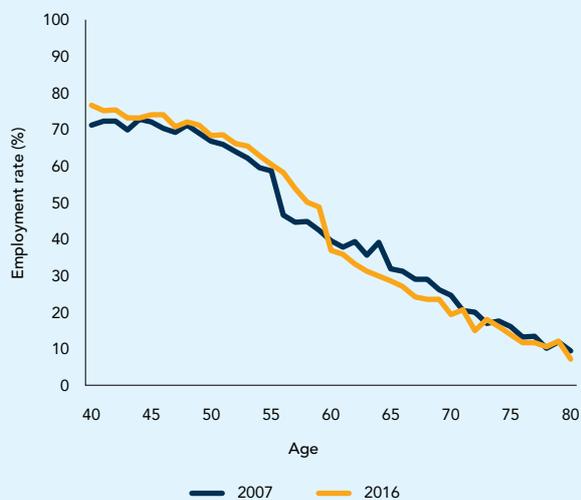
While efforts to increase Malaysia's minimum retirement age or minimum EPF withdrawal age might face political economy challenges, experience from pension reforms in different European countries show how the provision of information and the adoption of concepts from behavioral economics can at least partly mitigate some of these challenges (see Boeri and Tabellini 2012 for Italy, Fontoura Gouveia 2017 for Portugal, and Parlevliet 2017 for the Netherlands). Some countries, including Denmark, Italy, and the Netherlands, even aim to increase the normal retirement age beyond 70 years (see OECD 2019). Moreover, a number of OECD countries have made provisions to automatically link the normal retirement age to life expectancy, reducing the political economy challenges of repeated discretionary policy changes (see OECD 2019). Among countries' objectives for increasing the retirement age is to encourage longer working lives and to increase the financial sustainability of pension systems. To achieve these objectives, alongside gradually increasing the minimum retirement age, some countries have implemented policies to increase the employment prospects of older workers. For instance, Singapore has put in place the Retirement and Re-employment Act. This act requires employers to offer opportunities for eligible employees who turn 62 to continue employment in the company until age 67. If the company is unable to provide a reemployment opportunity for the worker, it will be required to offer the worker an employment assistance payment equivalent to up to 3.5 months of his or her salary, up to a maximum of SGD13,000.²⁰

Beyond age 40, some workers in Malaysia exit the labor market, a process that happens even faster beyond age 55.

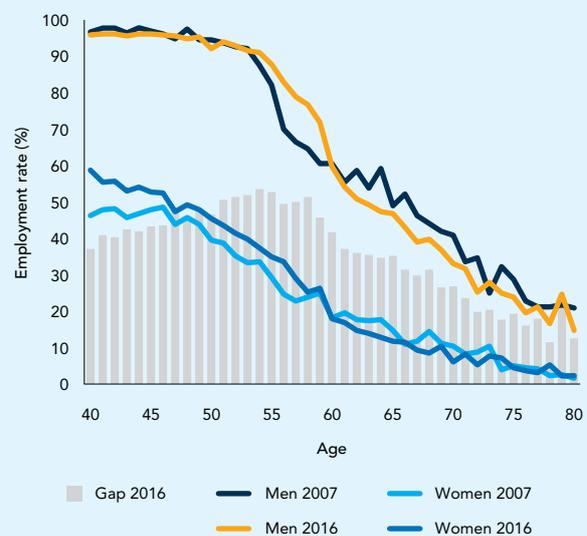
Figure 3.6 shows that employment rates are generally highest among workers age 25 to 50 and very gradually start to decline after age 40. In 2016, 76.6 percent of those age 40 were employed. In the same year, the employment rate was 68.4 percent, 36.9 percent and 19.3 percent for those age 50, 60 and 70, respectively. For those age 80, the employment rate stood at 7.2 percent. As is evident from these figures, relatively few persons exit the labor market between age 40 and 50, but the pace of decline in the employment rate increases after age 50. In fact, it is most rapid between age 55 and 59, supporting the notion that the EPF minimum withdrawal age of 55 years acts as a signal to retire. A comparison of employment rates by age between 2007 and 2016 reveals a largely similar pattern, with the exception of a marked increase of employment rates for persons between age 56 and 59—which suggests that this change in employment rates was driven by policies affecting the relevant cohorts differently rather than by age effects (see Box 3.2). This pattern suggests that the introduction of the minimum retirement age in 2012 led to an increase in the employment rate for persons age 56 to 59 between 2007 and 2016.

Women exit the labor market at much younger ages than men. According to Figure 3.7, the gap in the employment rates of men and women is large at all ages. For instance, in 2016, 58.7 percent of all women age 40 and 17.9 percent of all women age 60 were employed, while this was the case for 95.8 percent of all men age 40 and 59.7 percent of all men age 60. This resulted in a gender gap in employment rates of 37.1 percent and 41.8 percent at age 40 and age 60, respectively. Generally speaking, gender gaps in employment rates narrowed between 2007 and 2016 as female labor force participation rates increased steadily over time (see World Bank 2019b). Nevertheless, pronounced gaps persist across all age groups, indicating distinct employment patterns between men and women. In addition to lower employment rates of women of all age groups, there are also noteworthy differences between three distinct age groups. *First,*

²⁰ Similarly, other countries have also introduced promotional policies to increase the employment prospects of older workers. In Japan, employers have been given subsidies to hire older workers since 2003, and small or medium-sized companies that provide employees with the opportunity to work until age 70 are provided with variable financial aid, depending on the number of employees covered. In the Republic of Korea, starting 2011, a new system of subsidies aimed at retirement-age extension and retiree re-employment has been adopted in selected occupations, replacing a previous employment grant for older persons (see World Bank 2016).

FIGURE 3.6: Employment rate by age, Percentage

Source: Authors' calculations based on Household Income and Basic Amenities Survey 2007 and 2016 (DOSM).

FIGURE 3.7: Employment rate by gender and age, Percentage

Source: Authors' calculations based on Household Income and Basic Amenities Survey 2007 and 2016 (DOSM).

between roughly age 40 and 50, there is a relatively stable and significant gap in employment rates between men and women. *Second*, between roughly age 50 and 60 the gap is largest as women begin to retire earlier than men. *Third*, starting at roughly age 60 the gap gradually narrows as the remaining men and women exit the labor market. Data from the Labour Force Survey indicate that housework and family responsibilities—which can be defined to include household chores and caregiving—are the main reason cited by women, including women age 50 and older, for being outside of the labor force (see World Bank 2019b). In contrast, the main reason cited by men age 50 and older is old age.

Low levels of female labor force participation throughout working age, combined with women's early labor market exit leads to a large gender gap in employment rates at older ages. The average retirement age reflects the actual age that people leave employment, as opposed to the legally defined normal retirement age.²¹ Figure 3.8 shows that in Malaysia the average retirement age is 67.1 for men whereas among women it is 61. As a result, the difference in the average retirement ages between men and women is 6.1 years. This is substantially larger compared to OECD countries, where the difference is only 1.7 years on average. Compared to other upper middle- and high-income countries, Malaysia's average retirement age is very low for women and about standard for men. Hence, at 33 percentage points, the gender gap in the employment rate of workers age 55 to 64 is higher in Malaysia than in most comparator countries, including Singapore and Thailand, which have gender gaps of 22 and 25.5 percentage points respectively (see Figure 3.9).

Among Malaysia's three main ethnic groups, Indian men on average retire earliest followed by Chinese men and then by Bumiputera men. Figure 3.10 compares employment rates of men by ethnicity and age while Figure 3.11 does the same for women. Figure 3.10 shows that the employment rate of Indian men has the steepest decline, while the employment rate of Chinese men undergoes a more gradual decline.

21 The average age of retirement (or average effective age of retirement) is calculated as a weighted average of the declines in the participation rate over a 5-year period for people in each 5-year age group between the ages of 40 and 80 at the beginning of the period and those aged 5 years older at the end of the period (OECD 2019). For Malaysia, this is calculated for 4-year intervals due to the availability of data.

BOX 3.2

Distinguishing between age and cohort effects

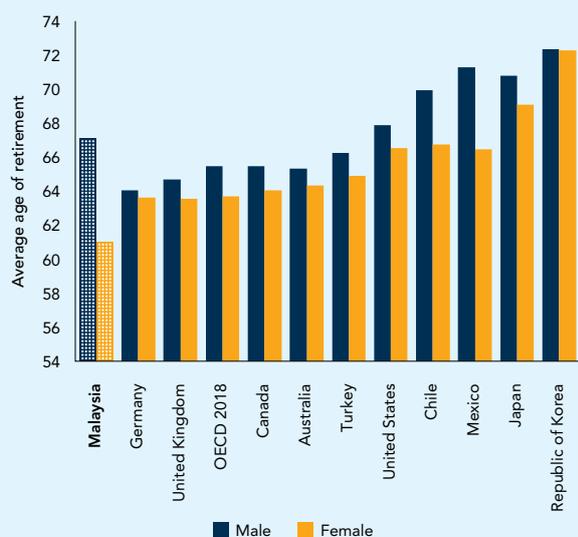
To understand changes in the employment patterns of older workers over time, it is important to distinguish between age and cohort effects. An age effect is a change in variable values that is experienced by all birth cohorts as each cohort grows older, independent of the time period. In contrast, a cohort effect is a change which affects populations born at a particular point in time, but is not affected by the process of persons getting older (see Blanchard et al. 1977). Distinguishing between age and cohort effects is not straightforward without access to panel data (see Bell and Jones 2013), but understanding the two concepts can nevertheless be useful to draw some inference from repeated cross-sectional data.

This section utilizes repeated cross-sectional data collected from surveys of different individuals in different years. DOSM's Household Income and Basic Amenities Survey is conducted twice in five years and involves interviews with respondents that are randomly selected in each period to form a nationally representative sample. Hence, for any given year, it is not possible to identify the precise, quantitative contribution of age and cohort effects to the employment rate for different age groups or similar variables.

Nevertheless, if similar patterns are observed again and again over several years this suggests the presence of an age effect, while patterns that change frequently over time suggest that there is likely a cohort effect. Presenting data for more than one year reveals, to some degree, patterns that can be attributed to a worker's life cycle. For instance, a downward trend in employment after the age of 40—which becomes more pronounced after the age of 50—is observed in Figure 3.7 for both men and women and using data for both 2007 and 2016. Additional data not presented in this report show very similar patterns for the years 2010, 2012 and 2014. The combination of this evidence suggests that the general decrease in employment rates as workers get older is not specific to any one cohort but due to an age effect. In contrast, data for 2007 and 2016 also show that while the employment rates of men between age 40 and 55 remained more or less constant, the employment rates of women in this age group increased between 2007 and 2016. This implies that there is likely a cohort effect at play. In other words, women born in later years are comparatively more likely to be employed between age 40 and 55 than those born earlier.

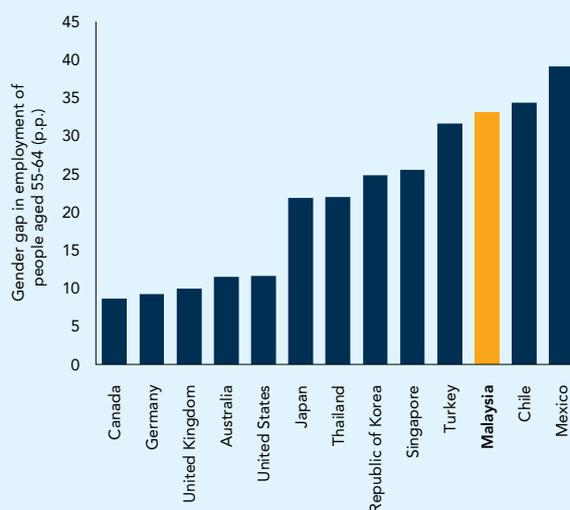
The employment rate of Bumiputera sharply falls at around 60 but only slowly declines beyond that age. According to the figure, the difference in employment rates between age 59 and 61 is 20.1 percentage points for Bumiputera men, 12.5 percentage points for Chinese men, and 24.7 percentage points for Indian men. In addition, the figure also shows that Bumiputera men age 66 have the highest employment rate, at 46.2 percent, followed by the Chinese men at 42.9 percent, and Indian men at 17.8 percent.

FIGURE 3.8: Average age of retirement by gender and country, Years



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM) and OECD.

FIGURE 3.9: Gender gap in employment of workers age 55-64 by country, Percentage points



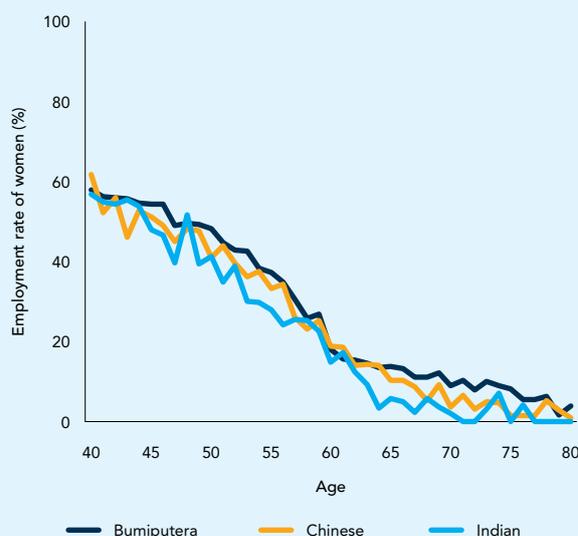
Source: Authors' calculations based on Labour Force Survey 2017 (DOSM), ILOSTAT and OECD.

FIGURE 3.10: Employment rate of men by ethnicity and age, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

FIGURE 3.11: Employment rate of women by ethnicity and age, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

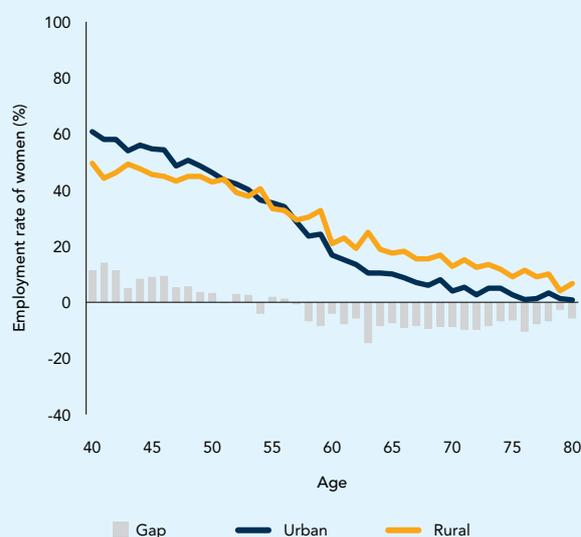
There are only small differences in the employment rates of older women between ethnicities, with Indian women having the lowest average employment rate. The employment rates of Bumiputera, Chinese, and Indian women age 40 are 57.9 percent, 61.8 percent, and 56.8 percent respectively (Figure 3.11). Among those age 50, the rates are 48.2 percent, 41.1 percent, and 41.3 percent, respectively. The employment rates of Bumiputera, Chinese, and Indian women age 60 are markedly lower at 18 percent, 18.9 percent, and 14.8 percent, respectively. Across all three ethnicities, the employment rates for women age 70 years are even lower, at 8.9 percent, 3.5 percent, and 2.1 percent, respectively. Beyond age 70, very few Chinese and even fewer Indian women are employed, and employment rates among Bumiputera women continue to fall steadily.

FIGURE 3.12: Employment rate of urban and rural men by age, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

FIGURE 3.13: Employment rate of urban and rural women by age, Percentage



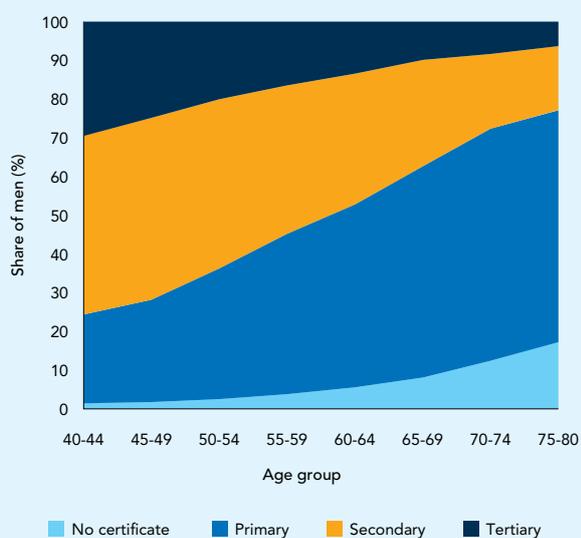
Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

Older workers from rural areas are more likely to work compared to those from urban areas, particularly beyond the minimum retirement age. Figure 3.12 shows that between age 40 and 55, the employment rates of urban and rural men are both around 94 percent. The difference in the employment rates between urban and rural men start to widen at age 56, with the employment rate of rural men exceeding that of urban men by 4.5 percentage points. This gap increases with age. The employment rate of rural men age 60 years exceeds that of urban men by 18.8 percentage points and the gap averages 28.6 percentage points between age 61 and 80. For women, differences between urban and rural areas are less pronounced (at least among workers age 50 and above) and also exhibit different patterns. Among women in their 40s and 50s, rural women are generally less likely to be employed than urban women, but the reverse is the case for women age 60 or above. According to Figure 3.13, the employment rate of urban women age 40 years exceeds that of rural women by about 11.3 percentage points. In contrast, among women age 61 to 80, rural women are on average 8.2 percentage points more likely to work than urban women.

Productive Characteristics and Types of Jobs

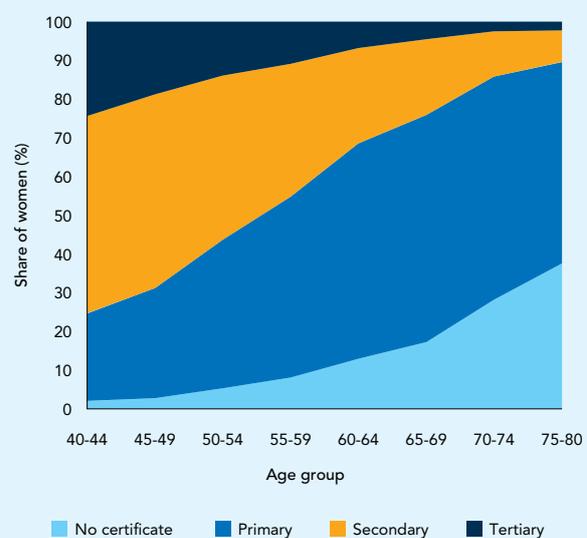
Today's older workers have relatively low education, but the sustained expansion of educational opportunities since the formation of today's Malaysia means that this is gradually changing. Since the formation of today's Malaysia in 1963, educational attainment has been gradually increasing. In 2016, more than 70 percent of persons age 70 and above had at most primary education while the same was true for only about 25 percent of persons in their 40s (see Figure 3.14 and Figure 3.15). This has two implications. *First*, to improve the potential productivity of today's older workers, dedicated skills-building initiatives that consider the target group's relatively low average level of education are a necessity. The need to provide upskilling and reskilling opportunities for older workers has also become more pertinent against the backdrop of rapid technological advancement and the COVID-19 pandemic, which has accelerated changes in skills demand already underway beforehand, such as an increasing demand for digital and socioemotional skills (see World Bank 2020). *Second*, since today's younger workers are tomorrow's older workers, higher levels of educational attainment among comparatively younger cohorts will gradually increase the average level of education among older persons. This will make it more and more imperative to harness the full productive potential of all workers, including older workers.

FIGURE 3.14: Share of men by educational attainment and age, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

FIGURE 3.15: Share of women by educational attainment and age, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

Older workers with higher levels of educational attainment are more likely to be employed in high-skilled occupations. Figure 3.16 and Figure 3.17 show that while most workers age 60 to 80 are employed in mid-skilled occupations, those with tertiary education are more likely to be employed in high-skilled occupations. Specifically, 78.1 percent of men and 84.7 percent of women age 60 to 80 with tertiary education are employed in high-skilled occupations. At the same time, sizable shares of men and women in the relevant

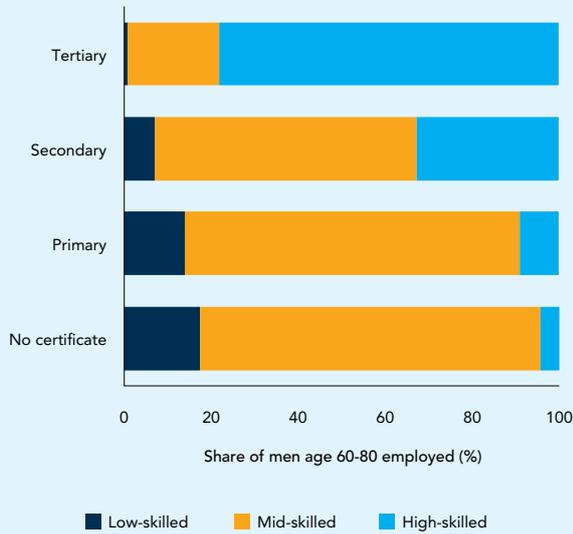


age range with secondary education are also employed in high-skilled occupations, at 32.6 percent and 23 percent respectively. It is worth noting that skilled employment is usually less physically demanding (see Acemoglu and Autor 2011 and Dicarlo et al. 2016). Thus, it may be relatively more compatible with the physical abilities of older workers.

While a relatively large share of older workers are engaged in agriculture, the services sector has become the largest employer of workers age 40 to 80. Figure 3.18 and Figure 3.19 show that the share of men and women age 60 to 80 working in the agriculture sector—a very distinct sector, see Box 3.3—is higher than the share of men and women age 40 to 59 working in the sector. At the same time, the figures also show that the services sector has become the largest employer of workers age 40 to 80, especially among women.²² This corresponds to the structural transformation of Malaysia in the last three decades from an agriculture-driven to a services-driven economy (Abdur Rahman and Schmillen forthcoming). In fact, the share of men and women age 60 to 80 employed in the agriculture sector has been declining in the last decade. The share of men age 60 to 80 employed in the sector declined from 47 percent in 2007 to 35.9 percent in 2016 and that of women from 46 percent in 2007 to 28 percent in 2016.

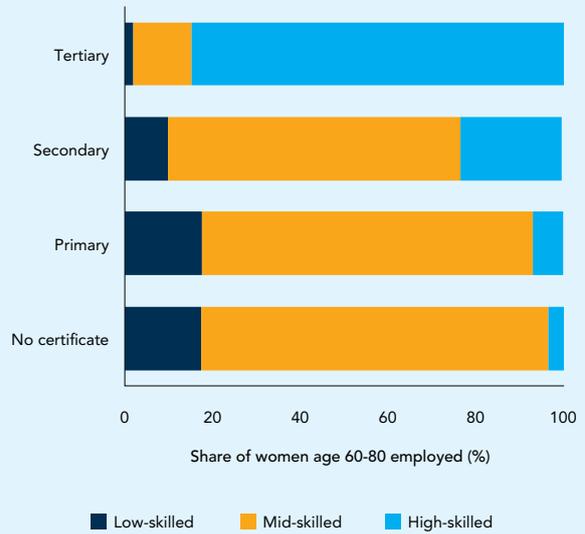
²² The increasing employment share of the service sector among older workers can be attributed to both demand- and supply-side factors. According to ILMIA (2019), employers in the accommodation and food service activities, education, and human health and social work activities are all comparatively receptive to the hiring of older workers. In parallel, again according to ILMIA (2019) older workers who are interested in self-employment cite accommodation and food services, agriculture, and education as preferred sectors, while those who are interested in salaried employment cite accommodation and food service activities and information technology as preferred sectors.

FIGURE 3.16: Share of older men employed by educational attainment and skill level, Percentage



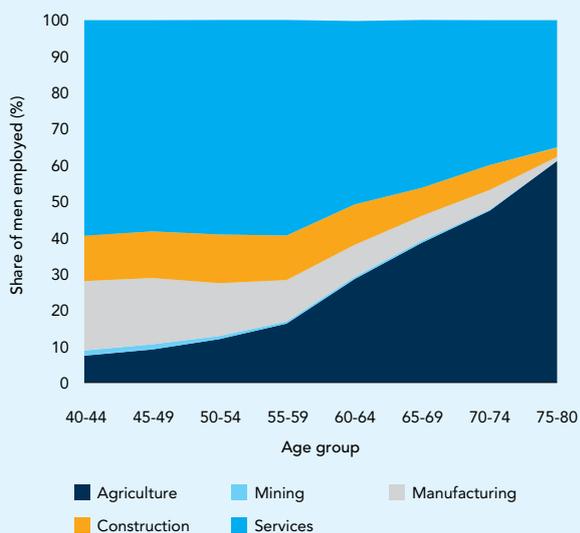
Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

FIGURE 3.17: Share of older women employed by educational attainment and skill level, Percentage



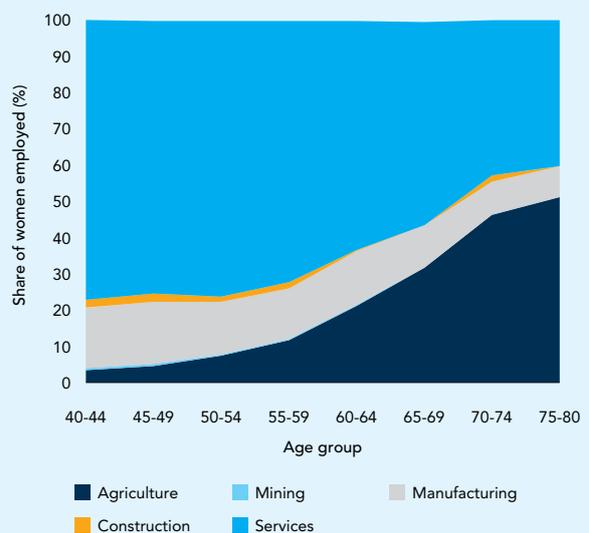
Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

FIGURE 3.18: Share of men employed by sector and age, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

FIGURE 3.19: Share of women employed by sector and age, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

BOX 3.3

The agricultural labor market

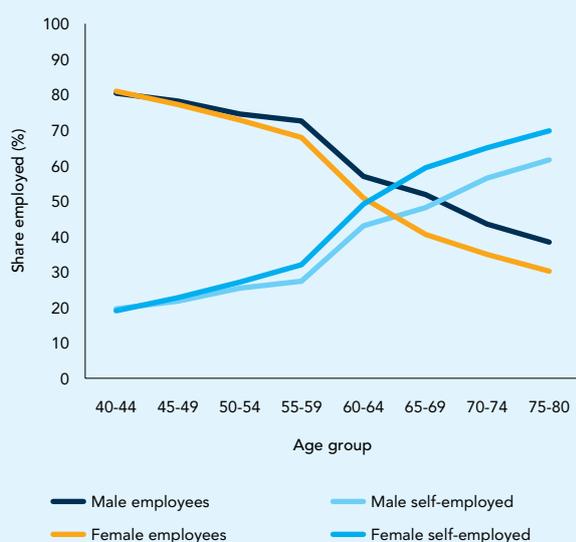
Malaysia's agricultural labor market is very distinct. According to variables describing the structure of employment, Malaysia's agricultural sector (which encompasses the plantation sector) is very distinct from other sectors. *First*, the share of self-employed workers is high, at 71.4 percent compared to 17.6 percent in other sectors. *Second*, the share of workers who are not Malaysian citizens is high. Data from the 2017 Labour Force Survey indicates that 37.5 percent of workers in the agriculture sector are noncitizens, compared to 12.7 percent in other sectors. *Third*, the agriculture sector employs a higher share of workers age 55 to 64 than all other sectors except for services. *Fourth* and finally, workers in the agriculture sector are also more likely to work in rural areas, and to have lower earnings. Put together, these distinguishing features set the agriculture sector apart. In addition, they also mean that an analysis of the types of jobs for older workers either needs to carefully consider the interplay between agricultural work and other characteristic elements of their jobs—such as the high rates of self-employment—or exclude the agriculture sector. This report largely follows the second approach.

The agriculture sector requires its own set of policies in the face of an aging workforce and a changing economy. The distinct nature of the sector, and particularly the large share of older workers in the sector suggests that general labor market policies and programs adequate for the non-agricultural sectors are not always appropriate for the agriculture sector. Instead, at least some dedicated policies and programs might be needed to address employment- and aging-related issues in the agriculture sector. While a dedicated analysis of the agricultural labor market in Malaysia and its relationship to aging is beyond the scope of this report, it is worth noting that Malaysia is not the only country where the agricultural labor market is very distinct.

Malaysia can learn from other countries' experience in supporting older workers during their transformation out of agriculture (see World Bank 2019a). For example, the French government bought out older farmers and granted them secure lifelong pensions before proceeding to transform the rural farming system through grants and loans to youth entrepreneurs, a process that was instrumental in the consolidation of farms. The Republic of Korea's government applied a similar strategy, through the provision of retirement packages and the subsidization of monthly contributions by farmers and fishers to the national pension system. The payments allow older farmers to retire, while releasing the land to more productive uses. World Bank (2019a) suggests that it is also worthwhile for Malaysia to consider such strategies, with the objective to protect the livelihoods of older farmers while allowing for the modernization and increased productivity of the agriculture sector.

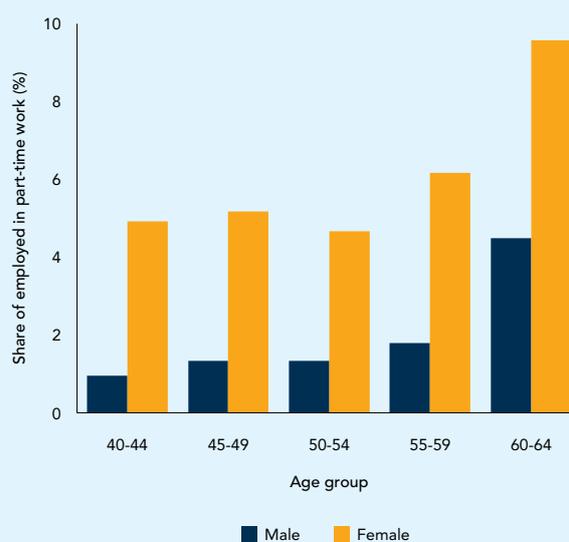
As workers age, self-employment becomes more and more prevalent. In Malaysia, as in other countries in the region, the percentage of workers that are self-employed increases significantly with age (see World Bank 2016). Excluding agricultural workers, who are more likely to be self-employed throughout their working lives, Figure 3.20 shows that as workers become older, the shares of both men and women who are employees decline, while the shares of men and women who are self-employed increase, especially markedly just beyond the minimum retirement age of 60. For instance, at age 40 to 44, 81 percent of both men and women are employees, at age 55 to 59 that is the case for 72.5 percent of men and 67.9 percent of women, and at age 60 to 64 it applies to 56.9 percent of men and 50 percent of women. This is consistent with the data collected by ILMIA (2019), which suggest that 53.3 percent of respondents age 40 and above who are interested in working in older ages plan to be self-employed. While no quantitative evidence on the precise magnitude of flows from dependent employment into self-employment among older workers is available, qualitative evidence indicates that many older workers in Malaysia indeed opt for self-employment after they have reached the minimum retirement age, partly due to the prospect of more flexible working hours (ILMIA 2019).

FIGURE 3.20: Share of workers by status in employment, gender and age, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
Note: Agriculture sector workers excluded (see Box 3.3).

FIGURE 3.21: Share of part-time workers by gender and age, Percentage

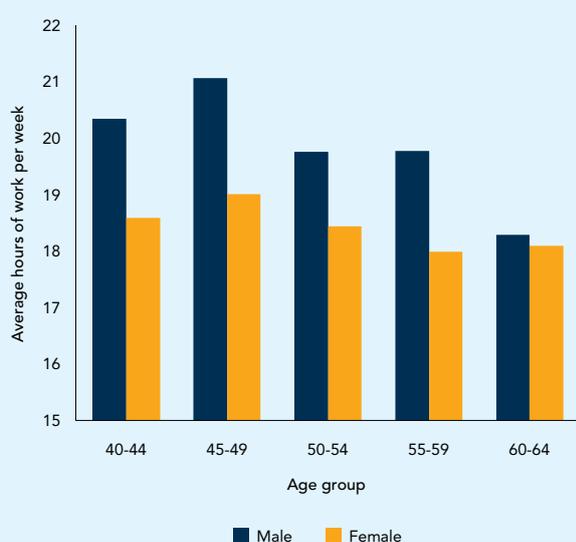


Source: Authors' calculations based on Labour Force Survey 2017 (DOSM).
Note: Part-time work defined as work of less than 30 hours a week.
Agriculture sector workers excluded (see Box 3.3).

Part-time work also becomes relatively more common as workers age. Within the group of non-agricultural workers from age 40 to 44, 0.9 percent of men and 4.9 percent of women work part-time, that is 30 hours or less per week. On the other hand, this is the case for 4.5 percent of employed men and 9.6 percent of employed women age 60 to 64 (see Figure 3.21). This pattern is consistent with studies on older workers in the United States (see Penner, Perun and Steuerle 2002), Sweden (see Wadensjö 2006), and Italy (see Trucchi, Fornero and Rossi 2018) that have also found that many older workers are willing to continue working beyond the normal retirement age instead of retiring if they have the option of working less hours. Even among part-time workers, average weekly hours are lower for older workers, particularly among men, while a comparatively lower share of older part-time workers would be willing to work longer hours. Figure

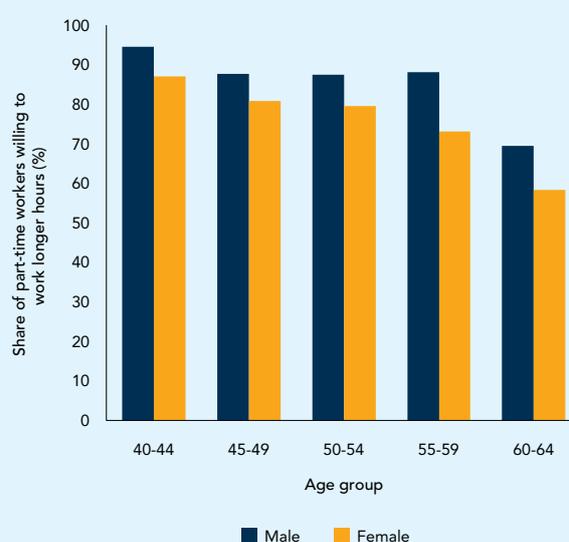
3.22 shows that the average number of working hours per week of part-time workers stands at 20.3 for men age 40 to 44 while it is 18.3 for men age 60 to 64. The average number of working hours per week of women who are part-time workers is 18.5, and is only slightly different for different age groups, although it is lowest for women age 60 to 64, at 18.1. In addition, Figure 3.23 shows that even though the share of part-time workers willing to work longer hours is relatively high across all age groups, it also declines with age. The relevant shares for part-time workers age 60 to 64 are 69.4 percent for men and 58.3 percent for women as compared to 94.5 percent for men and 87.1 percent for women among part-time workers age 40 to 44.²³

FIGURE 3.22: Average weekly working hours of part-time workers by age, Number



Source: Authors' calculations based on Labour Force Survey 2017 (DOSM).
Note: Part-time work is defined as work of less than 30 hours a week.
Agriculture sector workers excluded (see Box 3.3).

FIGURE 3.23: Part-time workers willing to work longer hours by age, Percentage



Source: Authors' calculations based on Labour Force Survey 2017 (DOSM).
Note: Part-time work defined as work of less than 30 hours a week.
Agriculture sector workers excluded (see Box 3.3).

Working at older ages, particularly if it is voluntary, is very often associated with greater life satisfaction and slower cognitive decline. Using data on workers in Europe and the United States, Nikolova and Graham (2014) find that workers age 46 to 65, as well as 66 and older who work full-time or voluntarily work part-time have higher levels of life satisfaction and subjective well-being than retirees. Some of the possible reasons for the positive association between working at older ages and subjective well-being are that employment provides social contacts and interactions, personal growth, autonomy, and a sense of purpose (see Nikolova and Graham 2014). Similarly, there are studies covering the United States (see Calvo, Haverstick and Sass 2009 and Bender 2012) and Germany (see Bonsang and Klein 2012) that find that involuntary retirement caused by constraints such as lack of employment options for older workers decreases these workers' subjective well-being. In another strand of research, working at older ages has been found to be associated with a lower risk of cognitive decline, including with regard to memory and mental health, as well as with higher average physical functioning (see Rohwedder and Willis 2010; Bonsang, Adam and Perelman 2012; Wickrama et al. 2013).

²³ Excluding the agriculture sector (see Box 3.3), 1,867 out of 3,167 part-time workers in the Labour Force Survey 2017 responded to the question on willingness to work longer hours.

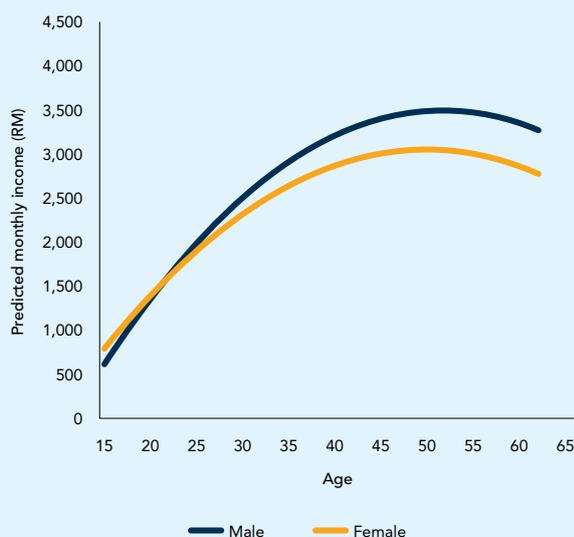
On average, workers' cognitive capabilities change, rather than decline, as they age. Changes in physical and cognitive capabilities that happen as people age, particularly if they continue working, do not necessarily affect productivity in an adverse way. Studies show that even though certain basic and higher-level cognitive functions—such as the speed of information processing and episodic memory—decline with age, other functions like semantic memory, language, and speech, improve with age (see World Bank 2015). Changes in capabilities can also be accommodated by making adjustments at the workplace in ways that enable firms to maintain, or even improve the productivity of older workers. In parallel, research has shown major improvements in cognitive functioning from generation to generation, a phenomenon known as the Flynn effect. Projections show that by 2034 the United Kingdom will have aged chronologically but due to the Flynn effect will in fact have become cognitively younger (see Skirbekk et al. 2013).



Many older workers are able to adapt to new technology while in turn, technology holds important potential in improving the productivity of an aging workforce. According to Gordo and Skirbekk (2013), many older workers are able to adapt to new technology irrespective of their level of educational attainment. In turn, there are at least three ways in which technology can potentially improve the productivity of older workers (see ADB 2018). *First*, improved health and longevity resulting from advancements in medical science and technology can extend productive working lives. *Second*, technology can transform work and workplaces to be less physically demanding and allows for flexible and remote work, which may better suit the physical capabilities and preferences of older workers. *Third*, innovative technology for improved delivery of education and skills training, as well as labor market matching technologies can increase the efficiency of job placements. Adaptive technologies at the workplace can augment physical strength as well as visual, hearing, dexterous, and cognitive capacities of older workers.

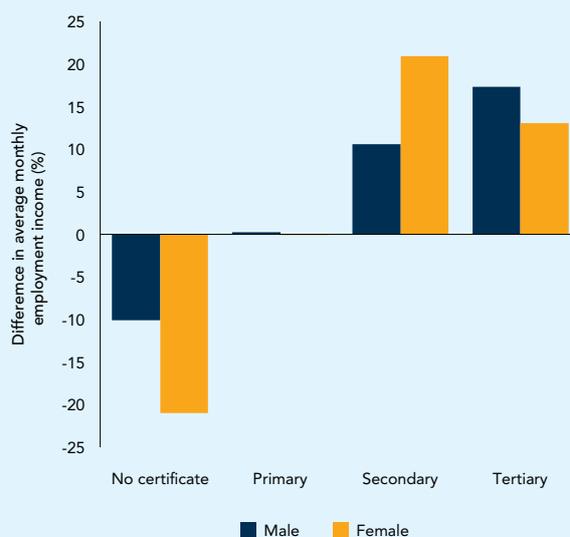
In Malaysia, the relationship between age and employment income is inversely U-shaped, with an earnings premium for more educated older workers. The average monthly employment income of men age 40 to 44 is RM4,587. It increases to RM4,854 for men age 45 to 49, and to RM4,884 for men age 50 to 54, before starting to decline. The average monthly employment income of men age 60 to 64 is RM4,003, and decreases to RM2,941 for men age 75 to 80. Controlling for the fact that older workers are on average relatively less educated, an inverse U-shaped relationship between age and income is observed for both men and women (see Figure 3.24). There is also a large gap between the earnings of men and women of almost all ages (see World Bank 2019b). Further, Figure 3.25 shows that there is some evidence of a seniority wage system in the sense that older workers earn higher incomes than younger workers with the same level of education. This evidence is particularly pronounced among more highly educated workers and among men. Men age 50 to 59 with at least a secondary education earn over 10 percent more than men age 40 to 49 with the same level of education. This evidence is particularly pronounced among more highly educated workers and among men. Men age 50 to 59 with at least a secondary education earn over 10 percent more than men age 40 to 49 with the same level of education.

FIGURE 3.24: Monthly employment income by gender and age conditional on workers' education, RM



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
 Note: Monthly income predicted based on a regression of the natural log of employment income on age, age-squared, and education of workers excluding the agriculture sector (see Box 3.3).

FIGURE 3.25: Difference in average monthly employment income between workers aged 40-49 and 50-59, Percentage

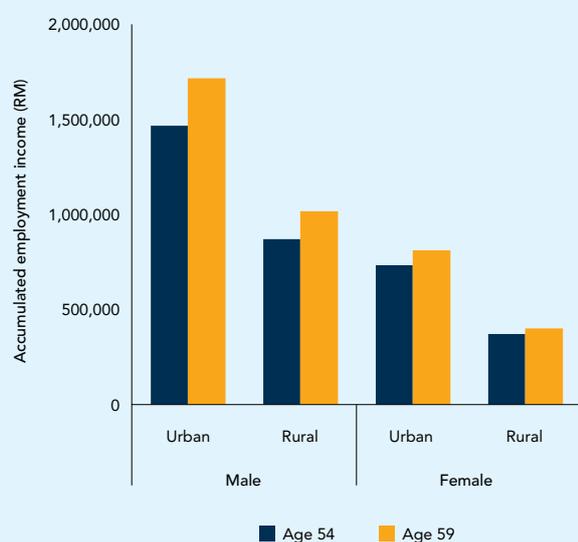


Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
 Note: Agriculture sector workers excluded (see Box 3.3).

49 with the same level of education. Differences are even more pronounced for men with tertiary education but less so for women and nonexistent or even reversed for workers with no or only primary education. The tentative evidence of a seniority wage system for at least some workers in Malaysia is important, as such a system may adversely affect the retention of older workers if it implies that their wages exceed their productivity. This has prompted some countries to implement policies to reduce seniority-based wages or entitlements (see OECD 2019).

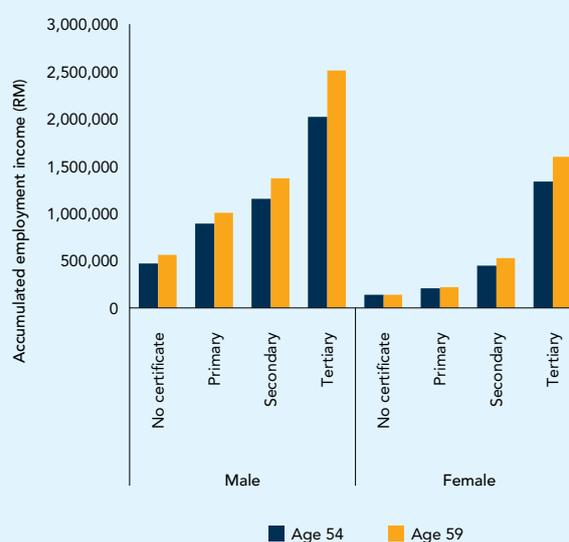
Women, workers in rural areas, and less educated workers accumulate lower levels of earnings over their careers. “Synthetic” estimates of lifetime earnings show that women, workers in rural areas, and less educated workers on average accumulate less employment income between age 20 to 59 compared to men, those in urban areas, and those with more education.²⁴ Figure 3.26 shows that, on average, men from urban areas can expect to earn about 1.7 times more than men from rural areas over their careers, while women from urban areas can expect to earn about twice more than their rural counterparts. Similarly, Figure 3.27 shows that both men and women with lower levels of educational attainment tend to accumulate less income over their careers. In both cases, men are more likely to earn more than women, both due to the higher labor force participation rate among men and due to the persistent gender wage gap (World Bank 2019b). The earnings accumulated over a workers’ career directly affects this workers’ ability to have an adequate income during old age, an issue discussed in detail in Section 3.2.

FIGURE 3.26: Average accumulated employment income from age 20-54/59 by location and gender, RM



Source: Authors’ calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
Note: Agriculture sector workers excluded (see Box 3.3).

FIGURE 3.27: Average accumulated employment income from age 20-54/59 by education and gender, RM



Source: Authors’ calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).
Note: Agriculture sector workers excluded (see Box 3.3).

²⁴ These estimates are obtained using the working population’s annual earnings at each age and summing up their age-specific average earnings for the years multiplied by the probability of employment (see Cheeseman Day and Newburger 2002 and Schmillen and Stüber 2014).

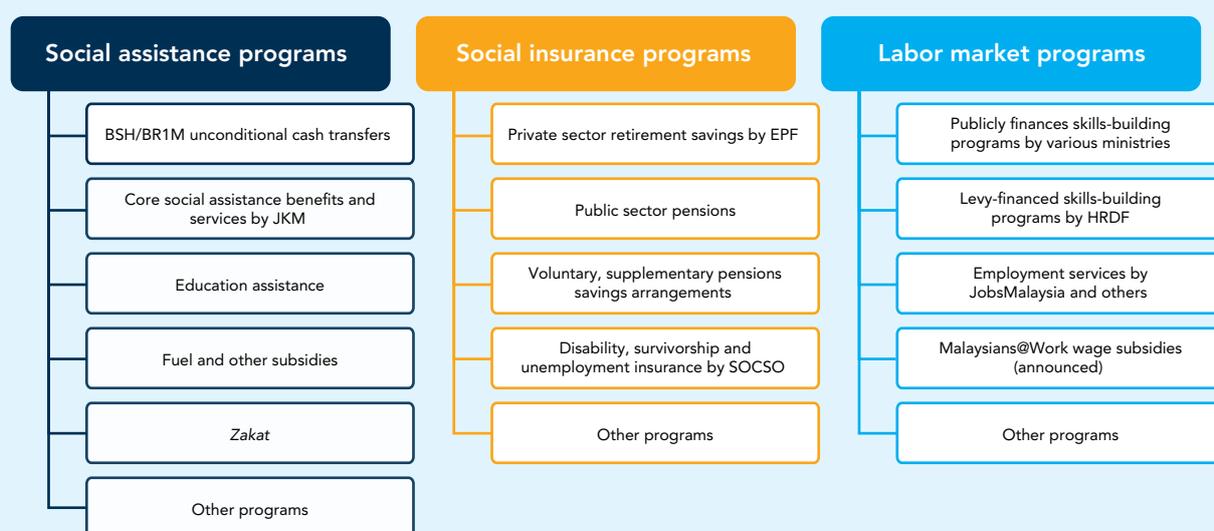
3.2 Income Security for Older Persons

Contributory Social Insurance

Over the past 70 years, Malaysia’s institutional framework for providing income security for older persons—including through retirement savings—has remained largely unchanged, in spite of rapid aging. Historically, families in Malaysia often financed the needs of older persons no longer able to work. Rapid aging and growth in the number of older persons have increased the importance of retirement savings arrangements to smooth incomes over the life cycle (see Chapter 1). As Malaysia’s population continues to age and urbanize and as co-residence declines, such savings arrangements in concert with broader social insurance policies must be adjusted to support the country’s increasing number of older persons.

Social insurance policies are part of a country’s overall social protection system which also encompasses social assistance and active labor market programs (ALMPs). *Contributory social insurance programs* encompass old-age and disability pensions and unemployment insurance; *non-contributory social assistance programs* include cash transfers, school feeding and targeted food assistance; and *ALMPs* include skills-building initiatives, employment services and wage subsidies. Together, these programs can facilitate the achievement of three objectives: *First*, they can increase resilience for the vulnerable by providing protection against the impact of declines in well-being. The COVID-19 pandemic shows how volatility increases in an integrated world, thus necessitating adaptive social protection. *Second*, they can provide equity for the poor through protection against destitution and the promotion of equal opportunity. *Third*, they can create opportunities for all through measures to build human capital in children and adults, as well as enable men and women to engage in more productive employment (see World Bank 2012).

FIGURE 3.28: Stylized overview of Malaysia’s social protection system



Source: Authors based on World Bank (2015)

In Malaysia, a number of different ministries and agencies are responsible for implementing social protection programs, under the coordination of the Malaysia Social Protection Council (MySPC).

The implementation of social protection programs faces inherent challenges related to coherence across agencies and programs. In this context, the relaunch of MySPC in 2020 to provide overall coordination has been an important development. Though the effectiveness of MySPC is still largely untested, MySPC could enable Malaysia to move from a set of social protection programs (see Figure 3.28) toward a more coherent social protection system.

Social insurance in Malaysia includes the Employees Provident Fund (EPF), the Social Security Organization (SOCSO), the Public Service Pension Fund (Kumpulan Wang Persaraan or KWAP), the Armed Forces Board Fund (Lembaga Tabung Angkatan Tentera or LTAT), and Private Retirement Schemes (PRS). Insurance companies also offer a number of occupational pension schemes and retirement products. EPF is Malaysia's mandatory private sector retirement savings scheme, while KWAP provides pensions to civil servants, and LTAT provides pensions to the members of the armed forces. The PRS are voluntary, supplementary pensions savings arrangements. SOCSO provides benefits for people with disabilities, survivorship and some health procedures. It also manages the employment insurance system (EIS), introduced in 2018. This report focuses largely on EPF as the retirement savings institution with the largest coverage but also covers SOCSO. Conversely, a discussion of the very specific challenges of ensuring old-age income security for civil servants and members of the armed forces, while safeguarding fiscal sustainability, is beyond the scope of this report.

EPF is a contractual savings institution established for the purposes of ensuring that citizens save for old age and other contingencies including housing, education and select medical procedures.

It is a defined-contribution provident fund with a regular minimum contribution rate of 11 percent for employees and 12 to 13 percent for employers.²⁵ There is no ceiling on wages subject to such contributions. Seventy percent of contributions are placed in Account 1, which is dedicated to old-age benefits, while the remaining 30 percent goes into Account 2, which can be used for home purchase or loans, tuition for tertiary education, and payment of the costs of specified treatments for major medical procedures and illnesses. The self-employed can contribute voluntarily to EPF. Balances are offered as lump-sums upon reaching a minimum withdrawal age and retirees can choose to make periodic withdrawals, though annuity options are not provided. Thanks to its strong governance structure, diversified investment strategy, and operational effectiveness, EPF has grown from a small pension fund set up in 1951 to one of the largest pension funds in the developing world (see World Bank 2017a).

EPF encourages voluntary contributions and has a relatively modest voluntary matching contribution scheme (*i-Saraan*) for eligible workers. EPF members who are self-employed and do not earn a regular income can make voluntary contributions toward retirement (up to RM60,000 per year), and receive financial support from the Government. The Government provides a 15 percent matching contribution for business owners, freelancers, professional accountants, doctors, lawyers, insurance/unit trust/property agents, and other eligible workers up to a maximum of RM250 per year. Selected Grab drivers (so-called Gold- and Platinum-tier drivers) who register with EPF's *i-Saraan* scheme also receive an additional 5 percent matching contribution, up to a maximum of RM80 per year.

²⁵ The statutory contribution rate for employees has been lowered from 11 percent to 7 percent from April to December 2020, as part of the Government's response to COVID-19 (see World Bank 2020).

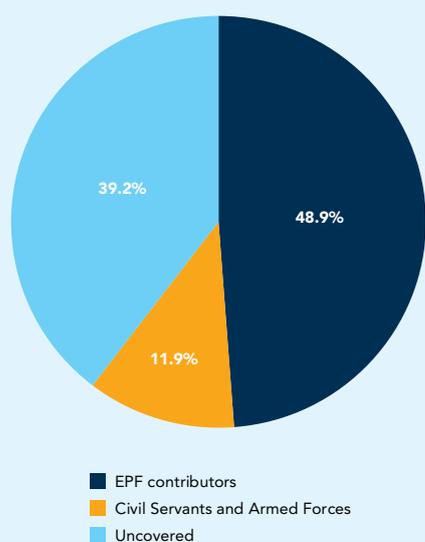
In Malaysia, while the majority of the labor force is covered by some form of retirement savings scheme, coverage is still far from universal.

In 2019, 11.9 percent of the labor force consisted of civil servants or members of the armed forces, while 48.9 percent contributed to EPF. This implies that 39.2 percent of the labor force were neither covered by EPF nor pension arrangements for civil servants or members of the armed forces (see Figure 3.29). Although workers contributing to EPF are technically “covered” by social insurance arrangements, many move in and out of standard employment. Thus, for many of them, their contribution histories tend to be inadequate to support their retirement (see Figure 3.31 and Figure 3.32 below). The relatively high and persistent coverage gap might be at least in part be due to the high prevalence of non-standard forms of work coupled with the only modest success of the *i-Saraan* scheme. For instance, according to the Labour Force Survey, the share of own-account workers (that is, self-employed persons without paid employees) as a proportion of all workers is relatively high and growing, increasing from 16.4 percent in 2010 to 18.1 percent in 2019 (see Figure 3.30). This translates into 2.7 million own-account workers in 2019. At the same time, there were only 137,000 EPF members who contributed to *i-Saraan* in 2019.

SOCSSO provides employment injury insurance, invalidity, survivorship and unemployment insurance to contributing members.

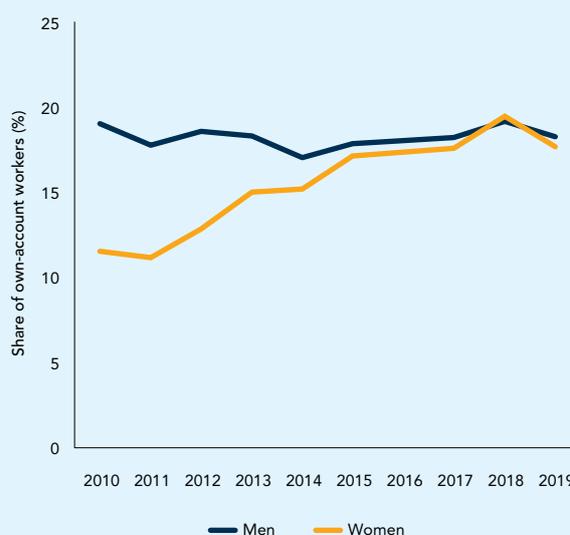
Contributions are mandatory for formal private sector workers. Employers contribute 1.75 percent of wages and employees 0.5 percent of wages to the employment injury and invalidity scheme. The wage base has a limit of RM4,000 per month. The employment injury scheme covers commuting accidents, industrial accidents, and occupational diseases. The benefits include a medical benefit, temporary disability benefit, permanent disability benefit, constant attendance allowance, vocational rehabilitation, a return to work program, a dependents’ benefit, a funeral benefit, and an education benefit. In addition, the invalidity scheme covers incapacity to work or death by causes not related to employment. Under this scheme, there are an invalidity pension, an invalidity grant, an attendance allowance, a survivors’ pension, a funeral benefit, facilities for physical or vocational rehabilitation and dialysis, and an education benefit.

FIGURE 3.29: Coverage of retirement savings institutions, Share of labor force



Source: Authors’ calculations based on EPF, KWAP and DOSM.

FIGURE 3.30: Share of own-account workers among all workers by gender, Percentage



Source: World Bank (2019b).

On top of the employment injury and invalidity schemes, SOCSO has supported unemployed workers through the EIS since 2018. This has an employer contribution rate of 0.2 percent of wages and an employee contribution rate also of 0.2 percent and provides unemployment insurance coverage and ALMPs.

In 2017, SOCSO covered about 43 percent of the labor force and expanded its social security protection scheme to the self-employed. In 2017, SOCSO had 16.5 million registered employees of which 6.8 million were considered active. It had about 569,000 beneficiaries, almost half of which were survivors. The criteria for required contributions in SOCSO is not aligned with the EPF and this partially explains the differences in coverage between the institutions. As an important recent initiative, in 2017 the employment injury scheme began providing benefits to self-employed taxi, Uber and Grab drivers. The contribution rate under this initiative was set at 1.25 percent of earnings per month and taxi, Uber and Grab drivers were given the option to select one of four salary options. The intention in 2017 was that by the year 2020, the scheme would be expanded to other informal sectors such as fishermen, farmers, hawkers, artists and others.

Occupational schemes, in particular the pension scheme for the civil service, are an important part of the landscape of retirement savings and old-age income protection. The civil service pension scheme is a defined-benefit occupational retirement benefit program. As the most important provider of annuitized benefits, it provides benefits both to retired civil servants and their dependents. The scheme provides relatively high replacement rates and an annuitized retirement benefit for almost 10 percent of the labor force. The scheme is non-contributory and benefits largely are paid out of the current budget. The pension benefit is 1/600 of the last drawn salary multiplied by the months of pensionable service (up to a maximum of 60 percent of the last salary after 30 years of service). For instance, a civil servant with a last salary of RM5,000 and 20 years of pensionable service will receive a pension of RM2,000. The last salary is used as the basis for pension determination, a practice which many countries are moving away from to improve predictability and fairness. Retirees also receive a lump-sum gratuity which is equal to 7.5 percent times the number of months of pensionable service times the last salary. For instance, the civil servant with a last salary of RM5,000 and 20 years of pensionable service will receive a gratuity of RM90,000. Pension rights vest on completing three years of service, and early retirement on completing ten years. Retirement is compulsory for public servants at age 60 though many qualify for retirement at an earlier age. There is a minimum pension of MYR820 per month for those with 25 years of service.

There are concerns that the civil service pension scheme may act as an obstacle to labor mobility and with regard to its sustainability and the predictability of benefits. There is no transferability of accrued rights between the civil service pension scheme and EPF though many civil servants opt to make contributions to EPF for a 10-year period before vesting and moving to the civil service scheme. Moreover, workers who defer their pension by moving to the private sector face significant portability losses. Many countries over the past few decades have undertaken measures either to harmonize the provisions between civil servant schemes and national social security schemes or to merge such schemes and establish a supplemental scheme for civil servants. In addition to the issue of labor mobility, there are concerns regarding the civil service pension scheme's sustainability (see Section 2.2 and studies cited therein) as well as the predictability of its benefits. Therefore, it would be useful to further review the long-term fiscal cost attributable to the scheme as well as the anticipated levels of income replacement in retirement. However, such a review and the development of specific policy recommendations regarding the civil service pension scheme are beyond the scope of this report.

Complementing EPF, the civil service pension scheme and SOCSO, Private Retirement Schemes (PRS) serve an important function by enabling Malaysians to save additional funds for retirement.

PRS are voluntary, supplementary, and tax-advantaged savings vehicles established in 2012 to improve the adequacy of pensions savings. In March 2020, there were eight PRS providers with assets of about RM3.5 million and 455,000 members (or about 2.8 percent of the labor force).

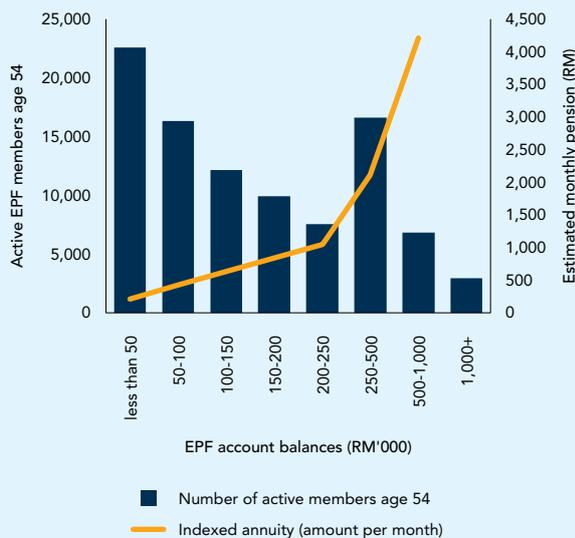
Among the primary criteria to evaluate the performance of Malaysia’s system of contributory retirement savings and to identify potential adjustments are the adequacy, coverage, and affordability of the system (see World Bank 2008).

An adequate system with high coverage is one that provides benefits sufficient to prevent old-age poverty to the full breadth of the population, in addition to providing a reliable means to smooth lifetime consumption for the vast majority of the population. An affordable system is one that is within the financing capacity of individuals and society and that does not unduly displace other social or economic imperatives or have untenable fiscal consequences.

Adequacy and coverage of Malaysia’s system of contributory retirement savings are major challenges.

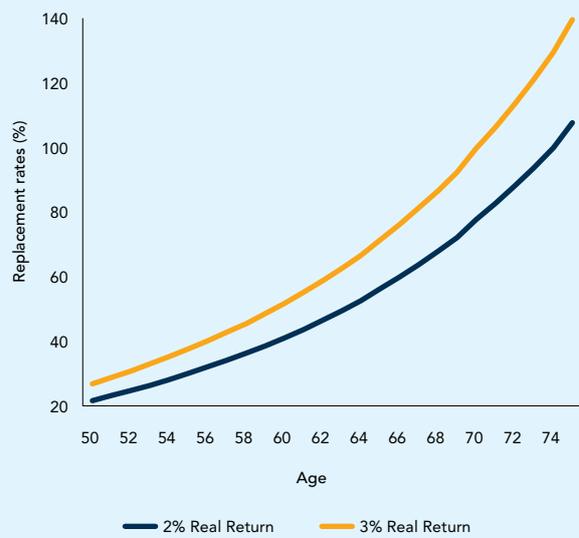
The distribution of balances for active EPF contributors at age 54 suggests that a majority of retirees will receive very low benefits in retirement from their EPF accounts (see Figure 3.31). Over half of members at age 54 have balances of under RM150,000 and almost three quarters have balances under RM250,000. Translated into an indexed annuity, almost three quarters of workers retiring with active EPF accounts will have a monthly benefit of less than RM1,050, only slightly more than the PLI of RM980 before its recent revision (see World Bank forthcoming). Moreover, over 40 percent of EPF retirees would have an annuitized income of less than RM420 per month, only slightly higher than the Department of Social Welfare’s (*Jabatan Kebajikan Masyarakat* or JKM) Financial Assistance for Older Persons’ (*Bantuan Orang Tua* or BOT) benefit of RM350 per month (see below).

FIGURE 3.31: Active EPF members age 54 and estimated pensions, Number and RM



Source: Authors’ calculations based on EPF.

FIGURE 3.32: Simulated replacement rates by EPF minimum withdrawal age, Percentage



Source: Authors’ calculations based on EPF.

While the real rates of return on individual balances have been substantial, the low minimum withdrawal age has been one of the key reasons for low balances. The minimum withdrawal age is 50 for Account 2 and 55 for Account 1, which is very low by international and regional standards and also lower than the minimum retirement age of 60 (see Section 3.1). Along with the fact that many EPF members engage in intermittent formal work, this means that the contribution rate would have to be inordinately high to support a meaningful replacement rate as a percentage of final salaries. Life expectancy at age 55 is 24.5 years. Thus, many workers will spend longer in retirement than as active contributors. Increasing the minimum withdrawal age from 55 to 65 could almost double the effective replacement rate for individuals who work continuously from age 30 (see Figure 3.32). This is due to three effects: individuals could contribute for an additional 10 years, substantially increasing balances at retirement; they would reap an additional 10 years of dividends; and the payout period would be substantially shortened.²⁶

Another reason for low benefits is that many workers do not contribute to EPF for part or all of their working lives. Malaysia's coverage of retirement savings institutions is slightly below expectations when benchmarked against other countries (see Figure 3.33).²⁷ On average, countries with a higher GDP per capita have higher coverage by retirement savings institutions. This is primarily due to the positive correlation between GDP per capita and the proportion of workers in "standard" employment relationships—characterized by long-term, full-time wage employment with a single employer—which are most amenable to contributory retirement savings schemes. The pattern that countries with a higher GDP per capita have higher coverage also reflects that many upper middle- and high-income countries have been able to extend the coverage of retirement savings institutions to the self-employed. Malaysia falls slightly short of the global benchmark; it would need to increase coverage by about one percentage point to align with it. To achieve more adequate benefits, it would also need workers to contribute longer.

Workers from low-income households have both lower rates of coverage with EPF and lower balances at age 54 (see Figure 3.34). Those with lower incomes are less likely to be in "standard" employment relationships covered by EPF. Average contributions per person are also relatively low among the B40, resulting in low balances. The low coverage and adequacy amongst the B40 suggest that measures are needed to increase coverage amongst workers outside of "standard" employment relationships. It also suggests that a substantial portion of older persons will need public assistance in addition to EPF payouts.

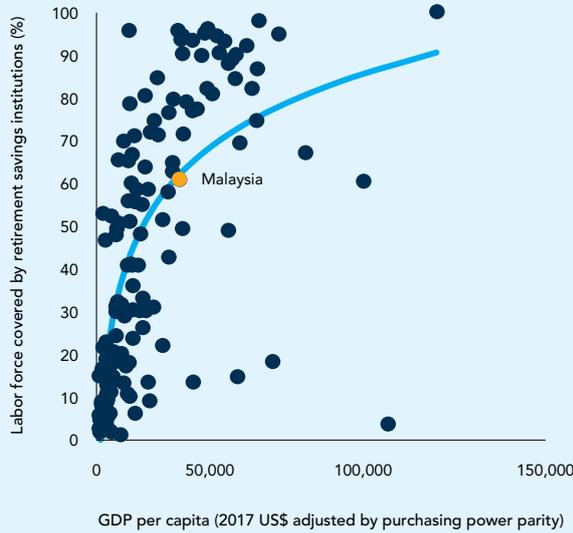
Women also have both lower rates of EPF coverage and lower balances. There are two reasons why a disproportionate number of women are uncovered by EPF and other forms of social insurance. *First*, as already mentioned in Section 2.2 and Section 3.1, the female labor force participation rate in Malaysia is comparatively low. *Second*, many of the women who participate in the labor market are self-employed or engaged as unpaid family workers or in the informal sector and thus, outside of "standard" employment relationships. In addition, women who are covered by social insurance, on average, have lower EPF balances than men, partly due to the prevailing gender wage gap (see World Bank 2019b). As a result, the average EPF balance at age 54 is RM177,000 for women and RM233,000 for men.²⁸ Taking a broader view on how well-protected women are by pension systems, Chlon-Dominczak (2016) ranks eight countries in East Asia according to (i) the pension coverage, (ii) the expected years in wage employment, (iii) the projected pension benefit for female average earners, (iv) the difference between the level of men's and women's pension benefits at average wage levels (v) the degree of redistribution toward retirees who earned lower wages, and (vi) access to and level of survivor benefits. According to this ranking, women are in an overall relatively

²⁶ Anecdotal evidence suggests that the frequent underreporting of earnings by employers also contributes to low balances.

²⁷ The number may overstate coverage for Malaysia as it is based on the number of people who made at least one contribution in the 12 months to December 31 2019. The number of people who make consistent contributions is likely to be lower as many EPF members engage in intermittent formal work.

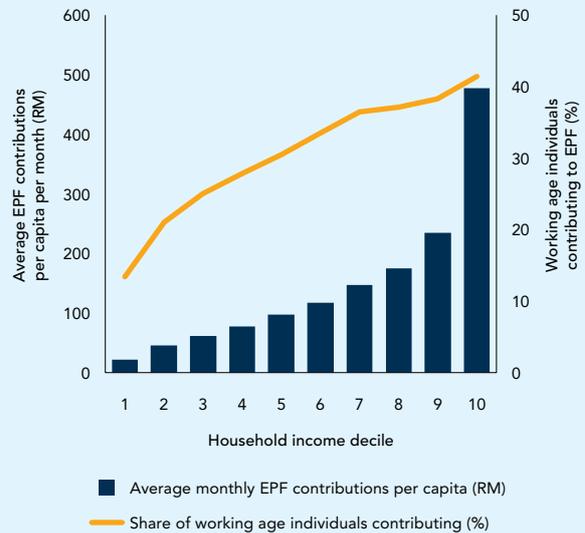
²⁸ In 2020, a new rule was enacted enabling a male EPF member to divert 2 percent of his monthly earnings (from the total 11 percent employee contribution rate) into the EPF account(s) of his lawful wife or wives. This measure is meant to increase retirement savings among women.

FIGURE 3.33: Labor force covered by retirement savings institutions, Percentage



Source: Authors' calculations based on World Bank Pensions Database and World Development Indicators.

FIGURE 3.34: Working age individuals contributing to EPF and average contributions per capita per month, Percentage and RM



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

good situation in Mongolia, China and Thailand. In contrast, Malaysia takes the seventh place overall, and is placed last in terms of coverage, expected years in wage employment, and projected pension benefits.

EPF balances are offered as lump sums and not as annuities or phased withdrawals limiting consumption smoothing during retirement or protection against longevity risks. Retirees can voluntarily leave their balances in their EPF accounts and while some do, most must bear the full burden of investment and longevity risks in retirement. Rabi et al. (2019) estimate that more than two thirds of EPF members withdraw their full balances at retirement. This is a material weakness that exposes retirees to substantial risk, even those who may have accumulated substantial balances for retirement. Globally, most of the countries that historically had provident funds providing lump sum benefits have since transitioned either to phased withdrawals or provide annuitized benefits.

In the short term, the COVID-19 crisis may exacerbate the vulnerability of older persons while temporarily reducing savings for retirement among the active labor force. Temporarily, retirement savings will be reduced through declining EPF contribution rates, withdrawals from EPF accounts, and declines in asset prices. In fact, reduced contribution rates to and early withdrawal modalities from EPF accounts formed an important part of Malaysia's response to COVID-19. EPF members were given the option to reduce their contribution from 11 percent to 7 percent of wages from April to December 2020. In parallel, EPF members were also allowed to withdraw RM500 per month from April 2020 to March 2021. These measures were intended to increase households' liquidity during the crisis, and are estimated to amount to RM50 billion. Fortunately, retirement savings are intended to meet long-term needs and it is expected that most people with adequate savings will be able to withstand these short-term adjustments, just as they have in earlier economic crises.

The combined employer/employee EPF contribution rate of 23 to 24 percent (plus 3.5 percent of monthly wages up to RM4,000 for SOCSO) is relatively high, posing a challenge to the affordability of Malaysia's contributory retirement savings schemes. Malaysia has understandably kept the contribution rate relatively high with the aim to achieve improved adequacy in the face of a very low minimum withdrawal age. However, this has created challenges with regard to affordability. Potentially, it might also deter the formalization of some employment relationships and negatively impact Malaysia's international competitiveness.

EPF contributions, accumulations and distributions are largely exempt from taxation. Employers' and employees' contributions to the EPF are deductible expenses for purposes of corporate income taxes up to a maximum of RM4,000 per year. The benefits of tax deductibility of contributions for personal income tax most likely benefits individuals with higher incomes, as income tax rates are highest for these individuals. An individual can deduct RM9,000 per year from his or her income taxes both for him- or herself and a dependent spouse. There is additional tax deductibility of EPF and life insurance contributions of up to RM7,000 per year, for SOCSO contributions of up to RM250 per year, as well for other dependents based on other criteria. EPF dividend yields and lump-sum benefit distributions are not subject to personal taxation. Overall, this tax treatment provides an effective incentive and thereby improves the effective affordability of the EPF scheme for workers. However, this comes at the expense of the generation of tax revenues.

Non-Contributory Social Assistance

As most older persons in Malaysia have either no pension or an inadequate EPF balance, it is essential that non-contributory social assistance is strengthened to protect older persons against poverty and destitution. Over time, Malaysia's social assistance programs have experienced a considerable degree of evolution and proliferation. The country's largest social assistance program is the Cost of Living Aid Program (*Bantuan Sara Hidup* or BSH). BSH is an unconditional cash transfer program designed to benefit the B40. More closely related to the protection of poor and vulnerable older persons, JKM—under the Ministry of Women, Family and Community Development (MWFCD)—provides a core set of social assistance benefits and welfare services. In total, it implements ten programs intended to benefit specific vulnerable groups, including children, the disabled, and the chronically ill. Importantly, JKM provides cash assistance for poor and vulnerable older persons through BOT. To qualify, individuals must be age 60 or above and have no income or family which they can rely upon for support. JKM also provides substantial social assistance to poor and vulnerable older persons through its Public Assistance program directed at various vulnerable groups facing financial difficulties (*Bantuan Am* or BA). About three times as many older persons benefit from BOT than from BA (see Hamid 2020).

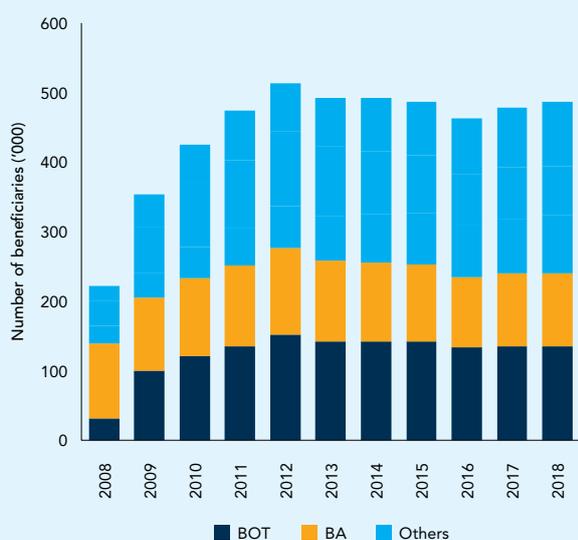
For BOT beneficiary selection, JKM utilizes a combination of income and categorical targeting. For instance, BOT provides beneficiaries with a cash transfer of RM350 per month and is targeted at persons over 60 with no fixed income to sustain their livelihood and no family support. Enrolment into JKM programs is managed by *eBantuan*, the JKM's information system and beneficiary registry. All information provided by the prospective beneficiary is verified through a home visit. To qualify for BOT like for most JKM programs, household incomes must be below the PLI of RM980 before its recent revision, though there has been a discussion that the program qualification requirements or benefit levels might be adjusted to account for the new PLI. In addition to JKM's outreach efforts and proactive applications by prospective beneficiaries, authorities at the district level can also make recommendations for inclusion into BOT and other JKM programs.

Overall, there were almost 500,000 beneficiaries of JKM programs in 2018, with a total expenditure on these programs of about RM1.7 billion. In 2018, the total expenditure on all 10 JKM programs stood at 26.7 percent of the allocation for BSH in the same year. As shown in Figure 3.35 and Figure 3.36, there were about 135,000 beneficiaries of BOT in 2018, equivalent to 27.6 percent of the total number of JKM beneficiaries. In the same year, Government expenditure on BOT amounted to about RM554 million, equivalent to 32.5 percent of JKM’s total expenditure on social assistance. Besides BOT, BA has in recent years been the program that has had the largest number of beneficiaries and accounted for the highest share of expenditures. In 2018, the total number of beneficiaries of BA stood at 106,000, with some individuals potentially being beneficiaries of multiple programs. In the same year, expenditures on BA amounted to RM266 million.

The number of older persons receiving social assistance benefits through BOT almost quintupled in the period from 2008 to 2012, but since then, the number has remained roughly constant. Figure 3.35 and Figure 3.36 show that the number of JKM beneficiaries increased from 221,602 in 2008 to 486,858 in 2018. Over the same period, there was also a marked increase in total expenditure. The most significant increase in coverage and spending occurred between 2008 and 2012. Since then, coverage and spending have been mostly flat, except in 2018, when expenditure increased by close to RM200 million. In terms of individual programs, the number of BOT beneficiaries saw a particularly significant increase—by more than 120,000—between 2008 and 2012 (from 31,000 to 152,000). As a result, BOT has become the largest JKM program with expenditures of RM554 million in 2018 as compared to RM78 million in 2008, possibly reflecting the fact that most older persons in Malaysia have either no pension or an inadequate EPF distribution.

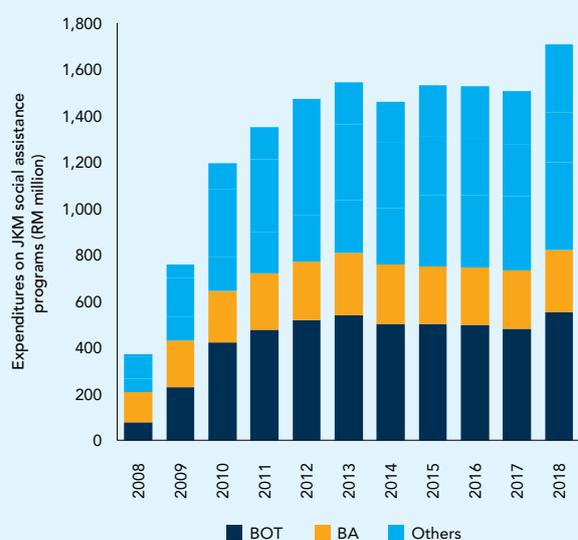
While BOT and other JKM programs are highly progressive, coverage among older persons is very low, even among the poorest and most vulnerable due to their relatively small budget allocation. Figure 3.37 shows that 34.4 percent of households with members age 65 and older in the bottom decile according to their income per capita receive BOT or some other form of assistance from JKM, with this share falling with each successive income decile. In total, 19.2 percent of B40 households with older persons are

FIGURE 3.35: Beneficiaries of JKM social assistance programs, Number ('000)



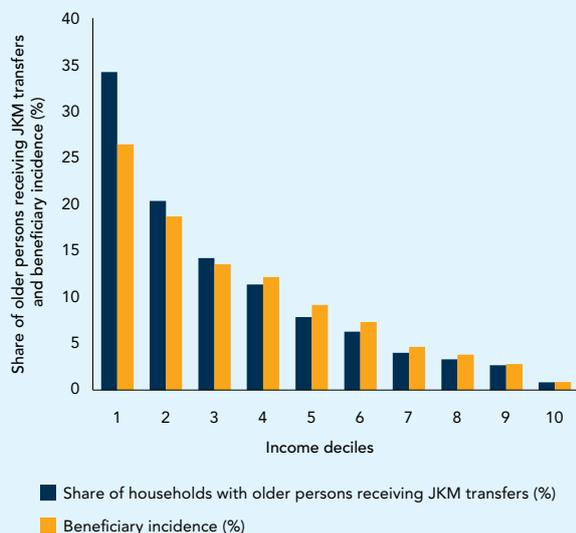
Source: JKM.

FIGURE 3.36: Expenditures on JKM social assistance programs, RM (million)



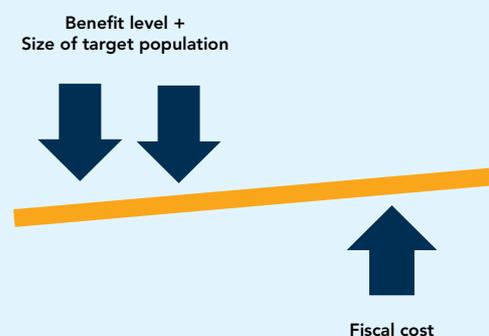
Source: JKM.

FIGURE 3.37: Share of households with older persons covered by JKM programs and beneficiary incidence, Percentage



Source: Authors' calculations based on Household Income and Basic Amenities Survey 2016 (DOSM).

FIGURE 3.38: Illustration of the tradeoffs in policy parameters for social pension



Source: Authors.

covered. The low level of coverage is unsurprising given the programs' relatively small budget allocation and narrow eligibility criteria. The average monthly transfer per person under the JKM programs is RM292, or about 70 percent of the average post-transfer income for JKM beneficiaries in the B20. To assess the performance of the JKM programs, it is illuminating to analyze their beneficiary incidence as a yardstick of the share of beneficiaries that are in a certain income bracket. According to Figure 3.37, JKM programs are progressive, with the bulk of social assistance being channeled to the B20. In fact, about 26.6 percent of all households with older persons who are covered by JKM programs are in the bottom 10 percent of the income distribution. That said, about 28.8 percent of covered households are not even in the bottom 40 percent of the income distribution. This suggests that there is still potential to transform these programs so that older persons most in need make up an even higher share of beneficiaries.

The need for strengthening social assistance also follows from the significant and potentially growing vulnerability of the current and future older persons in Malaysia. Section 2.3 shows that the extent of vulnerability of older persons is already significant, even though poverty rates among households with older persons are only slightly higher than among the population as a whole. Several factors, including demographics, will shape how the vulnerability of older persons will evolve. As outlined in Section 2.1, Malaysia's old-age dependency ratio is rapidly growing. As the ratio of older persons to the working-age population increases and families accordingly struggle to cope, this can potentially increase the financial vulnerability of older persons. In addition, household incomes are becoming more volatile both globally and in Malaysia, as evidenced by the COVID-19 crisis. As household incomes become more volatile, older persons that cannot work or have no other source of income become increasingly vulnerable. In addition to the gaps in coverage and adequacy of contributory retirement savings arrangements and existing social assistance programs for older persons, the significant and potentially growing vulnerability of current and future older persons provides a rationale for strengthening social assistance, as well as for prioritizing the poorest households.



There are a range of issues and options to consider when strengthening social assistance for older persons. In recent years, more and more countries have introduced broad non-contributory social assistance programs for older persons—often labelled “social pensions”. World Bank (2016) notes that the only countries in East Asia and Pacific with substantial pension coverage among poorer households are those with broad social pensions, such as China, Samoa, Thailand, and Timor-Leste, or with special treatment and subsidization of certain groups, such as Mongolia. If Malaysia is to follow this international trend, it will need to weigh the size of the target population, the benefit level, and the fiscal costs (see Figure 3.38). In addition, it will need to consider the benefit level and coverage for other contributory and non-contributory old-age income security schemes. There are four (not necessarily mutually exclusive) basic types of social pensions to consider:

- A **universal social pension** covers all persons above a certain age, usually with a flat benefit. It has the least effect on the incentives for work because the benefit is provided to all, regardless of economic circumstances or sources of retirement income. A universal benefit is also the easiest to administer. On the other hand, a universal benefit is fiscally the costliest so that achieving universality often necessitates reducing the amount of the benefit, or raising the eligibility age, or both. One approach that some countries (for instance Thailand) use to mitigate the cost is to have tiered benefits for different sub-groups among older persons, escalating the flat payment as people age. A universal social pension might also be seen as inequitable by some as even older persons with substantial pensions or other income receive a tax-financed social assistance benefit.
- A **pensions-tested social pension** covers older persons neither receiving a sufficient civil service pension nor having a sufficient balance with EPF to guarantee old-age income security. The rationale behind this type of benefit is that older persons whose livelihoods are already ensured through

contributory retirement savings schemes or other mechanisms do not need to receive a tax-financed social pension. A well-designed benefit would also incorporate some tapering, to avoid a harsh cliff for those with EPF balances just above the relevant threshold. Although a pensions-tested benefit is not as costly as a universal benefit, a large share of older persons would likely still need to be covered given that most older persons have either no pension or an inadequate EPF balance.

- A **means-tested social pension** targeted at older persons in poor or vulnerable households. In a sense, the current BOT program is a means-tested social pension targeted at very poor older persons who have no other source of support from family or other care providers. However, targeting is very narrow indeed as only 4 percent of persons 60 or older in Malaysia receive BOT. In contrast, in many countries means testing is used to target a much broader group of poor, as well vulnerable older persons that can easily fall into poverty in the face of hardship.
- A **supplemental social pension** is provided to older persons in poor or vulnerable households qualifying for other forms of social assistance. The rationale behind this approach is that it can ensure the livelihoods of older persons as a particularly vulnerable group and minimizes the administrative burden as compared to the establishment of an entirely new pensions-tested or means-tested social pension. At the same time, this option requires a strong implementation performance of the social assistance program that it is to supplement.

Rough cost projections suggest that the introduction of a social pension in Malaysia would only be fiscally sustainable if there was a limit to the size of the benefit or the size of the target population.

For the purposes of this report, rough projections compare the fiscal costs of four possible options of a social pension that differ with regard to the benefit amount (RM350 per month as with BOT vs. RM769 per month to cover 30 percent of the median wage according to EPF data), eligibility age (60 and above vs. 65 and above) and the targeting (4 percent of the relevant age segment as with BOT vs. 40 percent as with BSH vs. universal).²⁹ Of course various other parameters could be considered. In addition, the cost projections do not consider a pensions-tested social pension, explicitly consider the administrative costs of different options, or make any kind of statements with regard to whether a social pension should be introduced as an entirely new program or as a supplemental social pension. Nevertheless, a number of illuminating insights emerge (see Figure 3.39):

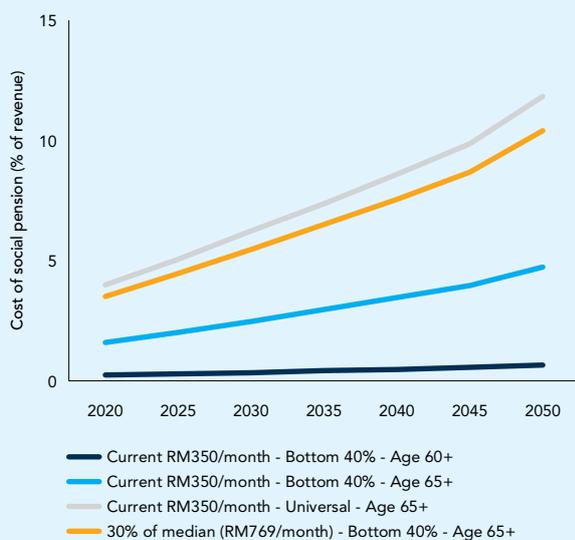
- As a benchmark, covering 4 percent of all persons age 60 and above and providing a benefit of RM350 per month as with BOT requires about 0.2 percent of fiscal revenues in 2020 (or 0.04 percent of GDP). Henceforth, costs would modestly rise in line with aging to 0.8 percent of projected fiscal revenues in 2050. This option would be fiscally sustainable but leave most poor and vulnerable older persons without income protection.
- A social pension that would extend the coverage of the current benefit of RM350 per month to 40 percent of persons age 65 and above would increase fiscal costs to about 1.6 percent of fiscal revenues in 2020 (or 0.2 percent of GDP). Henceforth, costs would rise in line with aging to 4.7 percent of projected fiscal revenues in 2050. This option would likely be fiscally sustainable, but both coverage and adequacy would be somewhat incomplete.
- A universal benefit of RM350 per month for all persons age 65 and above would cost about 4 percent of projected fiscal revenues in 2020 (or 0.6 percent of GDP). Costs would grow substantially thereafter, reaching 11.8 percent of projected fiscal revenue in 2050. This appears unaffordable.

²⁹ According to EPF administrative data, the median wage for covered workers at end 2018 was RM2,354 per month.

- A social pension covering 40 percent of all persons age 65 and above and providing a benefit of 30 percent of the median wage (MYR769 per month) would lead to initial costs of 3.5 percent of fiscal revenues in 2020 (or 0.5 percent of GDP), rising to 10.4 percent in 2050. This option also appears unaffordable at least in the short term, especially given the particularly constrained fiscal environment caused by the COVID-19 crisis. Thus, a universal social pension or one that provides a significantly higher benefit than BOT might be more of a medium-term ambition.

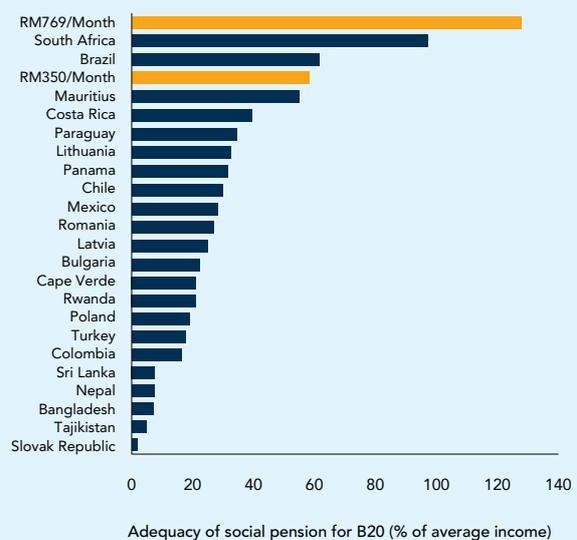
Before introducing a social pension, it would also be helpful to review the experience of some of Malaysia’s regional comparators. Various countries across East Asia and beyond have introduced social pensions, but there are significant cross-country differences in the objectives, implementation arrangements and adequacy—for instance as a percentage of the average per capita income of the B20—of these pensions (see Figure 3.40). For instance, Mongolia pays dedicated non-contributory social assistance benefits to less than 1 percent of older persons because the country’s contributory pensions scheme is generous and almost universal. The Philippines uses its social registry and proxy means-testing capability to target dedicated social assistance to the poorest and most vulnerable older persons. The benefit level is low but still meaningful for the target population. New Zealand has a social pension scheme which is universal and provides substantial benefit levels at considerable cost. However, it is worth noting that New Zealand does not have a mandatory contributory retirement savings scheme. Instead, it uses a framework of voluntary saving schemes to supplement tax-financed social assistance, in particular the default opt-in *KiwiSaver* scheme which covers around three quarters of the working-age population. In contrast, Australia requires employers to pay pension contributions and has a means-tested basic pension which covers around 60 percent of the older population, with around 40 percentage points of those receiving the full flat benefit and the benefit tapering as people’s tested income approaches the threshold.

FIGURE 3.39: Simulated fiscal cost of social pension, Percentage of revenue



Source: Authors’ calculations based on IMF, EPF, and UN WPP.

FIGURE 3.40: Adequacy of social pensions for B20, Percentage of average income



Source: Authors’ calculations based on Household Income and Basic Amenities Survey 2016 (DOSM) and World bank ASPIRE database.

3.3 Aged Care

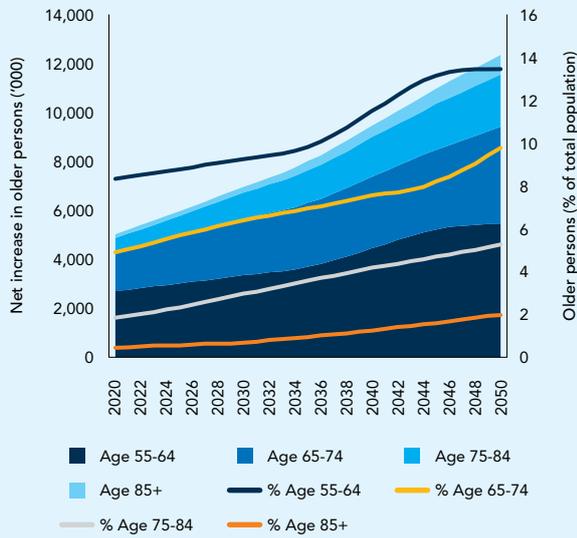
Demand, Provision and Financing

Rapid aging accompanied by a changing socioeconomic context poses a significant challenge to existing aged care arrangements in Malaysia. Like in many other countries in East Asia, familial provision of aged care—both social care and health care—has long played a critical role in Malaysia whereby frail older persons get support and care from their spouse, children, and relatives. However, this traditional arrangement is weakening as the typical household structure changes from large and multi-generation families toward smaller nuclear ones. The average household size in Malaysia has declined from 5.2 in 1980 to 4.1 in 2016 (see KRI 2018). In parallel, the proportion of households with only older persons has increased from 16.5 percent in 2004 to 19 percent in 2016 (see Section 2.3). While co-residence remains common, the share of three-generation households declined from 41.1 percent in 2004 to 30.7 percent in 2016. The decline in co-residence would affect households' ability to informally provide care to older household members. In contrast, the formal provision of aged care is still at an early stage of development. While home and community-based aged care services tend to have much lower unit costs, are generally preferred by almost all older persons and their families, and are typically able to provide adequate care to almost all older persons other than those with the most intensive care needs, public provision is weighted toward an institutional care model which provides a very small proportion of the most destitute with basic care services. Coverage of private institutional care is low and uneven with only relatively few exploratory attempts to establish viable, promising business models. Home and community-based aged care are at a small scale and confined mainly to urban areas.

Care needs will rise steeply due to rapid aging and increasing rates of individual functional limitations and dependencies among older persons. As detailed in Section 2.1, aging will accelerate in the coming decades, which has implications for the demand for aged care. *First*, the number of older persons will continuously rise from its base of 2.4 million in 2020. This rise will speed up over time, with a projected annual net increase of 100,000 older persons in 2030 and 210,000 in 2040 (see Figure 3.41). *Second*, the proportion of older persons age 75 and above among all older persons will significantly increase. *Third*, the prevalence of individual functional limitations and dependencies will increase as people get older, especially the oldest old who have a much higher prevalence of frailty and dementia. Altogether this will present a growing challenge to the social and health sectors in Malaysia.

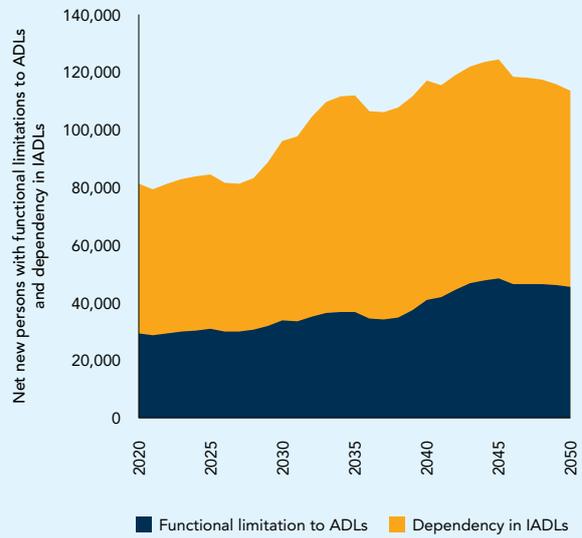
The prevalence of individual functional limitations and dependencies is rising in part because the prevalence of NCDs is higher among older than among younger persons. ADLs correspond to essential elements of self-care such as feeding, toileting, mobility, dressing, and cleaning. Hence ADLs functional limitations imply the need for substantive care services. IADLs are instrumental to enabling independent living—such as food preparation, shopping, housekeeping, and managing finances—which may be addressed by lower intensity home and community-based services. The number of persons with ADLs functional limitations is projected to increase from 770,000 in 2020 to 1,160,000 in 2030 and to 1,630,000 in 2040. In parallel, the number of persons with IADLs dependencies is projected to increase by about one million per decade (see Figure 3.42). Old persons tend to have a high prevalence of NCDs—a major cause of preventable disability worldwide (Richards, et.al 2016), underscoring the criticality of health promotion and health management for healthy aging. In Malaysia, 41.5 percent of those age 60 and above had diabetes in 2019, according to the National Health and Morbidity Survey 2019.

FIGURE 3.41: Projected net annual increase in older persons by age group, Number and Percentage



Source: Authors' calculations based on UN WPP and National Health and Morbidity Survey 2018.

FIGURE 3.42: Projected annual net new persons with ADLs limitations and IADLs dependencies, Number



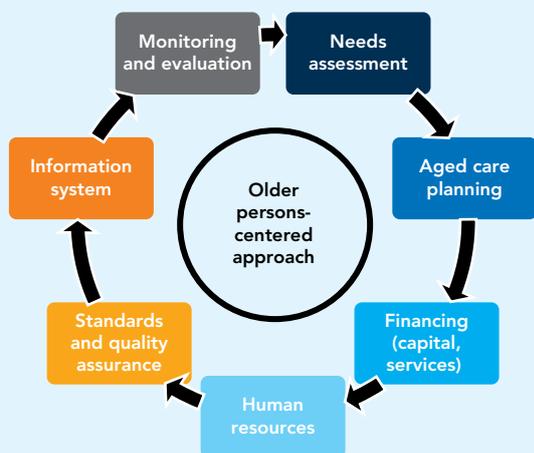
Source: Authors' calculations based on UN WPP and National Health and Morbidity Survey 2018.

The rise in functional limitations and dependencies is occurring against the backdrop of already significant unmet care needs. According to the National Health and Morbidity Survey 2018, 30.8 percent of those age 60 and above are malnourished. On top of that, the same survey also found that 30.8 percent of those in the same age group have poor social support. An earlier study using the 2003-2005 National Survey on Mental Health and Quality of Life of Older Malaysians painted a similar picture, showing that 18 percent of functionally disabled older persons suffered from unmet needs (see Momtaz et al. 2012). Moreover, the prevalence of dementia, a critical disability due to the intensity of care required, is estimated at 8.5 percent of those age 60 and over (or approximately 270,000 persons), according to the National Health and Morbidity Survey 2018.

An aged care system includes a set of building blocks that together enable the delivery of care services. Typical building blocks of an inclusive aged care system include needs assessment, aged care planning, financing, human resources, quality standards and assurance, an information system, and monitoring and evaluation (see Figure 3.43). Each building block is an interlinked sub-system that involves specific requirements as well as program design, financing and management aspects.

Since the early 1990s, there has been progress in establishing an inclusive aged care system. The Government has formulated a range of policies, plans and laws for strengthening aged care (see Appendix D for details). With regard to legislation, in 1993 the Care Centers Act (Act 506) placed the regulation of private aged care centers (and other care centers, equivalent to care homes) under JKM while in 1998 the Private Healthcare Facilities and Services Act (Act 586) placed the regulation of private nursing homes under MOH. The Private Aged Healthcare Facilities and Services Act (Act 802) was passed in 2018 to address the perception that regulatory stringency required by the Care Centers was too low and that the Private

FIGURE 3.43: Building blocks of an inclusive aged care system



Source: Authors.

TABLE 3.2: Types of aged care provision in Malaysia

Type of care	Public providers	Private and NGO providers
Institutional care	Care homes (RSK and RWT) Nursing homes (RE)	Care homes (RS) Nursing homes Retirement villages
Home and community-based care	Activity centers (PAWE) Home help and transport services (UPWE)	Daycare centers Home and community-based care

Source: Authors.

Healthcare Facilities and Services Act requirements were too high. After a five-year transition period, this Act places the responsibility of regulating private aged care facilities under MOH. In parallel to the legislative agenda, the Government has provided institutional care through care homes (*Rumah Seri Kenangan* or RSK and *Rumah Warga Tua* or RWT) and nursing homes (*Rumah Ehsan* or RE). It has also introduced home help services, activity centers (*Pusat Aktiviti Warga Emas* or PAWE), and transport services (*Unit Penyayang Warga Emas* or UPWE), as well as promoted health awareness and provided health care services for older persons. These initiatives are important for developing an aged care system. However, the system is still fragmented, because both the Federal Government and state Governments share responsibilities in financing and providing care for older persons while District and Local Authorities have responsibilities for policy coordination and implementation. Policies or regulations do not clearly define the respective roles and responsibilities of different levels of Government.

Malaysia’s aged care system caters to beneficiaries with a range of care needs and limitations and includes a range of service delivery models (see Table 3.2):

- **Publicly owned, financed and operated.** This model covers care services targeted at the destitute directly operated by public operators such as RSK for those without ADLs functional limitations, and at RE for those with such limitations or who are chronically ill. In addition, short-term care of up to seven days to allow caregivers respite is provided on-site at one RSK. Public health care services for older persons are provided directly by MOH.
- **Purely privately owned and financed and operated for profit.** This model includes a wide range of for-profit private aged care facilities providing regulated and unregulated services. Private daycare centers, care homes, and nursing homes are regulated, and operators require a license from the

relevant authorities (though there is also a large number of unlicensed providers, see Table 3.3 below). In contrast, some aged care services are unregulated including home live-in or daily care, mobile care, community care, and retirement villages.

- **Private not-for-profit and mixed models.** In this model, private provision is financed through public grants, private donations, or a mixture of the two, and delivered by nongovernmental organizations (NGOs). Examples of public financing of not-for-profit providers include care homes for older persons (*Rumah Sejahtera* or RS), PAWE, UPWE, and home help services which are run by NGOs with the help of volunteers (who receive a modest allowance). There are also some NGOs including foundations and charitable and religious organizations that rely purely on donations to run daycare centers, care homes and nursing homes.

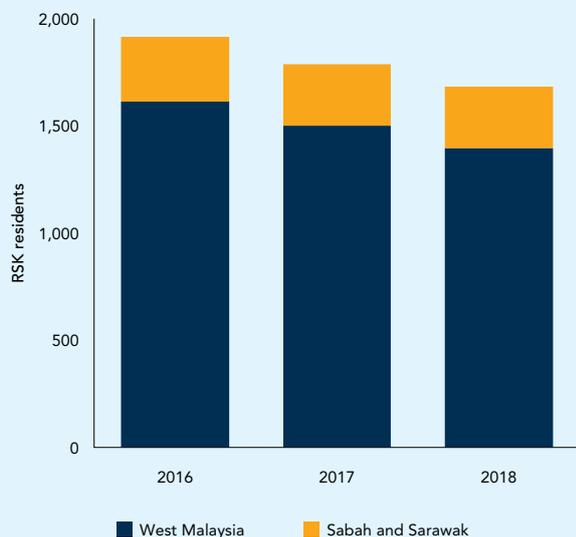
Institutional aged care covers only a very small portion of older persons. An estimated 731,000 older persons have ADLs functional limitations. In contrast, there are about 2,745 residents in RSK, RE and RS—or less than 0.4 percent of the estimated older persons with ADLs functional limitations. Private residential care homes have more residents than public ones, but still cover less than 5 percent of the potential demand. While precise data on the number of beneficiaries of private residential care homes are unavailable, estimates by informed stakeholders suggest that these homes provide for about 30,000 older persons. This is more than 10 times the total residential care provided by public providers but still covers just 5 percent of estimated older persons with ADLs functional limitations (see Table 3.3).

TABLE 3.3: Number of aged care facilities and beneficiaries

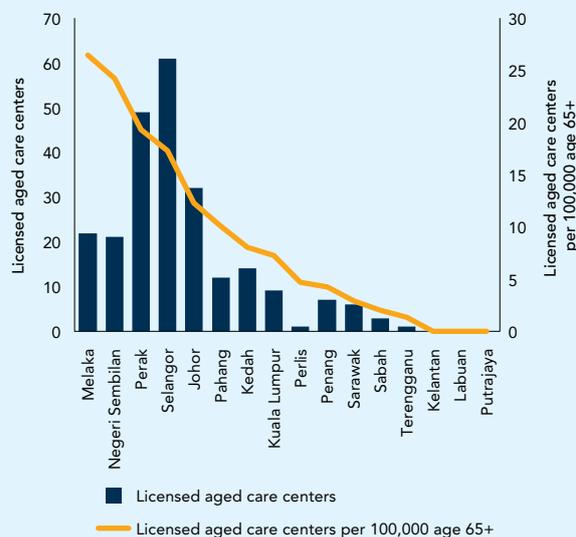
Care facility	Care type	Number	Beneficiaries
RSK	Institutional	17 facilities	1,681
RE	Institutional	2 facilities	207
RS	Institutional	63 facilities	857
Private residential care homes	Institutional	320 licensed and ≈ 1,400 unlicensed homes	≈ 30,000
Private nursing homes ³⁰	Institutional	24 licensed homes	N/A
PAWE	Home/community-based	88 centers	N/A
UPWE	Home/community-based	9 vehicles	5,512
Home help services	Home/community-based	2,150 volunteers	5,892
Private daycare centers	Home/community-based	6 licensed centers	N/A

Source: Authors' calculations based on JKM and estimates by informed stakeholders. Most recent available data.

³⁰ Private residential care homes include for-profit and not-for-profit providers, while private nursing homes include hospices but excludes psychiatric centers.

FIGURE 3.44: RSK residents, Number

Source: JKM.

FIGURE 3.45: Licensed private residential aged care centers by state, Number and Number per population age 65 and above

Source: Authors' calculations based on JKM.

The utilization of public residential aged care facilities is low and falling. The capacity of public residential aged care facilities in Malaysia (excluding Sabah and Sarawak) is approximately 5,000 according to correspondence with MWFC, but the actual number of residents is less than half of that, indicating public resources are not fully utilized. Potentially, this may be because of strict eligibility criteria or because only basic services are provided.³¹ In turn, it raises questions on how to improve the efficiency, quality and effectiveness of care provision for destitute older persons. These questions become even more pressing given that from 2016 to 2018, the number of RSK residents declined from 1,915 to 1,681 (see Figure 3.44). In parallel, their share among the population of older persons declined as well. While this decline might at least partly be due to a declining rate of destitution amongst older persons (a key eligibility criteria for placement in an RSK), there might also be evolving perceptions regarding quality of RSK relative to private options.

There has been an expansion of formal home and community-based aged care services, but these services still cover less than 1 percent of older persons with ADLs functional limitations. Home help services mainly provide home visits and food services and cover less than 6,000 older persons, largely in urban areas. Similarly, in 2018 transportation services helped 5,512 older persons access medical providers. In addition, there is a limited number of private for-profit or not-for-profit daycare centers that provide daycare services. The number of PAWE has also expanded substantially from 59 in 2018 to 88 in 2019, with expansion to a total of 133 centers planned for 2020. PAWE largely implement activities like physical exercises, recreation, health screenings, and education targeted toward older persons without ADLs functional limitations. While these activities are helpful to promoting productive and inclusive aging, in their current form PAWE are not daycare centers that provide care services and support to older persons with

³¹ A site visit to an RSK showed that services provided are in line with basic requirements, including personal care and protection, counselling, recreation, medical treatment, occupational therapy, and physiotherapy. However, the site visit also showed that only basic services were provided, leaving room to improve the scope, level and quality of aged care services at the public care homes and nursing homes.

ADLs functional limitations. According to the qualitative fieldwork conducted for this report, many older persons without significant ADLs functional limitations see home and community-based aged care services as more affordable and preferred alternatives to institutionalized care (see Interview quote 3.1).

INTERVIEW QUOTE 3.1

“It is pathetic if I have to live in old folks’ home. Because I do not know people there. I don’t like it! I visited the old folk’s home before—the environment is pitiful, and the cost is high as well.”

Source: 80-year old female, care recipient

Geographic disparities present another challenge to aged care provision in Malaysia. Today, there are significant imbalances in the supply of aged care services both between states and between urban and rural areas. Figure 3.45 depicts the number of licensed private residential aged care centers by state and their distribution relative to the population of older persons across states. Significant disparities emerge. For example, Melaka has 26 private residential aged care centers per 100,000 older persons, while Penang, Sarawak, Sabah, Terengganu, Kelantan, and the federal territories of Labuan and Putrajaya all have less than five. For care provision, differences in the local context—in addition to differences in norms and values between different ethnicities or other population groups that might also influence aged care demand in Malaysia—can have important implications for aged care planning and provision. It would be worthwhile to carefully examine these dimensions with more local data and information from localities, if available.

As Malaysia’s population ages, aged care provision will need to reach the large and growing “missing middle.” The small coverage of both public and private aged care services suggests that most aged care needs are unmet or met informally through home care provided either by hired domestic helpers or family members, often with economic and personal consequences such as less female labor market participation (see Interview quote 3.2, Interview quote 3.3, and Interview quote 3.4). Today, destitute older persons are targeted by public care homes and nursing homes, and well-off households can buy aged care services from the private sector. In contrast, most B40 households struggle to receive aged care services. On the one hand, they cannot benefit from public provision of services limited to the destitute. On the other hand, they are unable to afford private sector prices (see below). As a result, many low-income households rely on informal care provision by family members. Indeed, among those age 60 and above, 7.5 percent report experiencing neglect in the past 12 months, according to the National Health and Morbidity Survey 2018.

Public financing for aged care services also poses challenges—partly because it is very limited. Although the precise amount of the Federal Government’s expenditure on aged care services is unknown due to the co-mingling of some expenditures, total public spending is unlikely to have been much higher than RM61.4 million in 2020 (see Figure 3.46), excluding institutional care in Sabah and Sarawak. Nevertheless, this

INTERVIEW QUOTE 3.2

“I need to resign from my work and look for another job which has suitable time so that I can take care of my mother. I can’t have a permanent job, as I might need to take care of my mother anytime. I feel worried in terms of financial aspects, however I get to cover the expenses with my father’s retirement funds, and my brother also helps me with that.”

Source: 42-year old female, informal caregiver

INTERVIEW QUOTE 3.3

“I go out less now, as I need to take care of [my father]. We have to make a change, as this is our commitment, it is an obligation in terms of mental, physical, and financial.”

Source: 40-year old male, informal caregiver

INTERVIEW QUOTE 3.4

“It is not about my children don’t want to take care of me in the future, however they already get married, and have their own family. They need to take care of kids and go out for work. They have a lot of things to worry about. If we really need them to take care of us, it will become another burden for them.”

Source: 69-year old female, independent older person

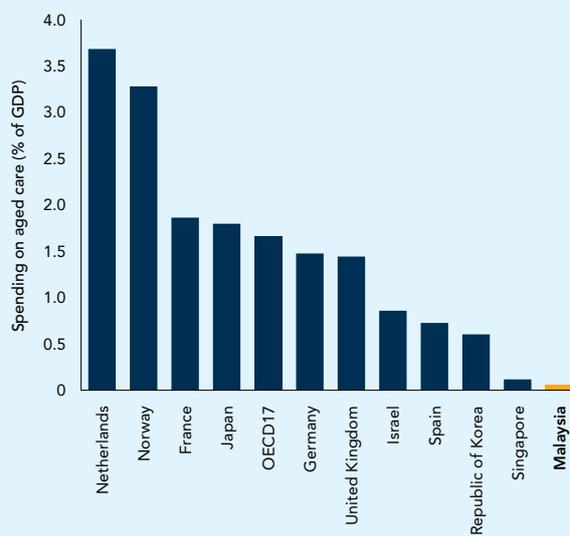
was an increase from RM46.8 million in 2015. In addition to financing from the Federal Government, State Governments also finance some aged care services. For example, Perak State allocates RM2 million toward social well-being initiatives for women, families, and older persons. Given the limited federal financing of aged care services and even more limited financing by State Governments, total public spending on aged care programs is estimated to account for only 0.01 percent of Malaysia’s GDP while private spending on aged care is estimated to be 0.06 percent of GDP. This means that Malaysia spends a much lower share of its GDP on aged care services than OECD countries (see Figure 3.47).

FIGURE 3.46: Public spending on aged care by year, RM (million)³²



Source: Authors’ calculations based on JKM and MOF.
Note: Data on spending on RSK in Sabah and Sarawak unavailable.

FIGURE 3.47: Spending on aged care by country, Percentage of GDP



Source: Authors’ calculations based on JKM, MOF, and OECD. Most recent available year.
Note: Data on Spending on RSK in Sabah and Sarawak unavailable.

32 Estimating total public financing for aged care is challenging because expenditures for directly provided services such as for RSK and RE are co-mingled under multiple categories (such as salaries and services and supplies) and cannot be easily separated out from the budget. For operational expenditures, these specific-object discrete-object (SODO) categories include emoluments, services and supplies, assets, transfers and fixed payments, and other expenditures. For development expenditures, the relevant SODO categories are services and supplies, assets, and transfers and fixed payments. Partly as a result of this co-mingling, the usability of public financing data for monitoring and evaluation purposes and the establishment of linkages between spending and outcomes is challenging.

Another challenge of public financing of aged care services is that this remains heavily skewed toward institutional care rather than home or community-based care (see Figure 3.46). More than four-fifths (82 percent) of public financing for aged care services is allocated to RSK and RE which serve less than 2,000 older persons throughout Malaysia, although this is a welcome decrease as RSK and RE received almost nine-tenths of public financing in 2015. However, as spending data for RSK in Sabah and Sarawak have not been available for purposes of this report, the proportion of overall public spending allocated to institutional care is likely to be even higher. The moderation in the skewness of public financing toward institutional care from 2015 to 2020 was driven by an increase in spending on home and community-based care services (such as for PAWE, home help services, and UPWE), which rose from RM5.3 million in 2015 to a budgeted RM11.2 million in 2020. Also of note is that the home and community-based care services are commissioned from NGOs rather than directly provided by the government.

Compared with private sector prices, unit operational costs for RSK and RE appear relatively high. Using a set of simple assumptions, the implied monthly operational costs per resident of public residential aged care institutions with dormitory-style accommodation in 2018 is estimated at approximately RM3,760 and RM2,232 for RE and RSK respectively. By way of comparison, prices for private aged care homes range from RM1,000 to RM2,000 in Kedah (for a twin room) to RM2,000 to RM3,000 in Putrajaya (for a triple shared room) per month according to a list of care centers compiled by the Association of Residential Aged Care Operators of Malaysia (AgeCope).³³

Quality Assurance and Human Resources

Malaysia's aged care quality standards focus on infrastructure but do not set appropriate service standards. The setting of appropriate quality standards encompassing both infrastructure and services is important to ensure the quality of aged care services and value for money. Malaysia's relevant laws such as the Care Centers Act, the Private Health Facilities and Services Act, and the Private Aged Healthcare Facilities and Services Act have specific legal schedules on the processes for licensing, approval, and enforcement for residential and daycare facilities but do not set quality standards themselves. With reference to the relevant laws, infrastructure standards have been introduced for care homes, nursing homes and daycare centers. However, service standards are not available which makes it challenging to guide, monitor and ensure the quality of aged care services.

COVID-19 infections in several aged care homes in Malaysia demonstrate the importance of service standards, in particular health and safety standards as part of a broader response to protect older persons. In response to COVID-19, Malaysia has implemented a range of proactive measures to improve infection prevention and control in aged care homes to protect frail older persons: MOH adopted an interim Recommendation for the Prevention of COVID-19 Transmission while JKM provided cash grants to private aged care homes. Furthermore, MOH announced an initiative to test all care home staff and residents—including in unregistered care homes—as part of measures intended to secure the safety of Malaysia's most vulnerable population and promote social and economic recovery. While these measures present a breakthrough in treating licensed and unlicensed aged care facilities equally, more public resources are needed (i) to make personal protective equipment available to caregivers, (ii) to strengthen coordination between the social sector and the health sector, as well as between residential facilities, health agencies and hospitals, and (iii) to build capacity for the medium-term management of health and safety in aged care homes (see Box 3.4).

³³ Prices as compiled by AgeCope typically include food, lodging, care, and some consumables but not adult diapers or medication.

BOX 3.4

COVID-19 and the protection of older persons

The COVID-19 pandemic has revealed numerous weak points of the aged care systems throughout the world. While hitting all population segments worldwide, the pandemic threat is particularly high in the case of older persons, and responses have shown disproportionately lesser impact, resulting in dramatic consequences in terms of loss of lives, opportunities and inclusion (see Rutkowski 2020).

The residency arrangements and care needs of vulnerable populations present particular challenges in the face of the pandemic. Dependent people staying in care homes generally live in close and sometimes crowded quarters, facilitating the spread of COVID-19. That is why many countries including Malaysia have enacted various measures to control infections and protect older persons dependent on long-term care. These measures span from prevention and control measures, to management of human and financial resources, to reporting and coordination with public health authorities. They include policies such as daily symptom screening, social distancing requirements, visitor restrictions, detection and quarantine procedures, enhanced disinfection regimes, staff training and protection, reporting procedures, clear leadership structures, awareness campaigns, and the adoption of other national or local guidelines and preparedness plans (see Wang et al. 2020).

Health and safety measures need to be further strengthened in Malaysia, especially those for personal protection equipment and coordination between social and health sectors. As of May 25, 2020, 83.8 percent of 10,890 staff and residents from 267 aged care homes had been tested for COVID-19 with 0.2 percent of tests coming back positive. Many care homes and nursing homes are reportedly still short of personal protective equipment for staff and caregivers (see Hasmuk et. al. 2020). Therefore, more public resources are needed to make personal protective equipment available to caregivers, to strengthen coordination between the social sector and the health sector and between residential facilities, health agencies and hospitals, and to build capacity for the medium-term management of health and safety in aged care homes. Testing also needs to be further scaled up to cover staff and residents in all aged care facilities. Measures for managing the workload of and guaranteeing sick leave for caregivers should also be continued to safeguard persons in care homes. In parallel, the coordination between care homes and hospitals should be better managed to facilitate a safe transition of patients to ensure the continuum of care services. In this context, modern information technology can be used as an effective tool to promote care integration, as well as to address emergency and psychological counseling care needs (see Rutkowski 2020). For instance, telehealth systems can be used to monitor vital signs and provide emergency and medical services while avoiding physical contact. Similarly, using teleconferencing and other communication systems can connect older persons to psychological counseling services and lessen isolation.

BOX 3.4 (continued)

The COVID-19 pandemic offers a wake-up call for countries including Malaysia to rethink how to reform, regulate and govern aged care systems to ensure older persons live in a healthy and safe environment. The COVID-19 pandemic has exacerbated some of the challenges of an aged care system overly reliant on institutional care. Accordingly, it has heightened the importance for Malaysia to introduce and expand formal home- and community-based aged care services. In addition, it has also highlighted the importance of strengthening the Government's stewardship capacity in areas such as needs assessment, quality standards, financing, human resources, regulation and governance, monitoring and evaluation. This will enable the Government to better meet the increasing needs of and provide more protection to older persons.

The quantity and quality of human resources are another crucial constraint for Malaysia as it develops and expands aged care services (see Interview quote 3.5). Following the definition of the International Labour Organization (2018), care workers are those who, for profit or pay, provide face-to-face services that develop the human capabilities of care recipients in a relatively dependent position, such as older persons. In the health and social work sectors, care workers encompass (i) personal care workers such as health care assistants and home-based personal care workers, (ii) health professionals such as doctors, (iii) health associate professionals such as medical technicians, and (iv) domestic workers who mind children, care for older persons or persons with disabilities, cook, clean, etc. Based on this classification, estimates for the size and composition of different types of aged care workers in Malaysia can be computed through a two-step procedure: *First*, care workers can be identified using the International Standard Classification of Occupations and the International Standard Industrial Classification at the two-digit level mapped to the Malaysia Standard Classification of Occupations (MASCO) and the Malaysia Standard Industrial Classification (MSIC), respectively. *Second*, a range of occupations and sectors not related to aged care (such as the education sector, as well as midwifery professionals and childcare professionals) can be excluded.³⁴

INTERVIEW QUOTE 3.5

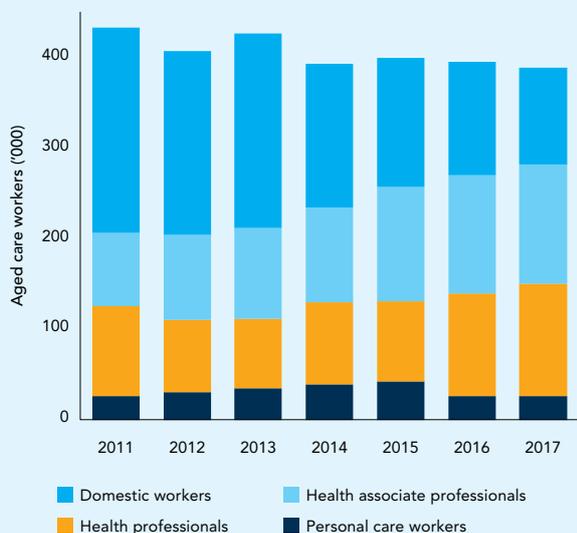
“Maybe people in authority are not aware of the increasing aging population. Or they don't have the funds to start training centers for caregivers. It is very hard to find and hire a local Malaysian as a caregiver. Even when we post a vacancy for caregiver positions, the response is poor.”

Source: 46-year old male, nursing home operator

There were 388,000 aged care workers in 2017—a slight decline as compared to 2011. During the same period, the share of aged care workers among total employment also declined, from 2.6 percent to 2.1 percent. Figure 3.48 and Figure 3.49 show that the decline in the overall number of aged care workers was primarily due to a decline in the number of domestic workers. This number dropped from 226,000 in 2011 to 106,000 in 2017. In contrast, the number of health workers (encompassing both health professionals and health associate professionals) increased from 180,000 to 256,000 while that of personal care workers was 26,000 in both 2011 and 2017.

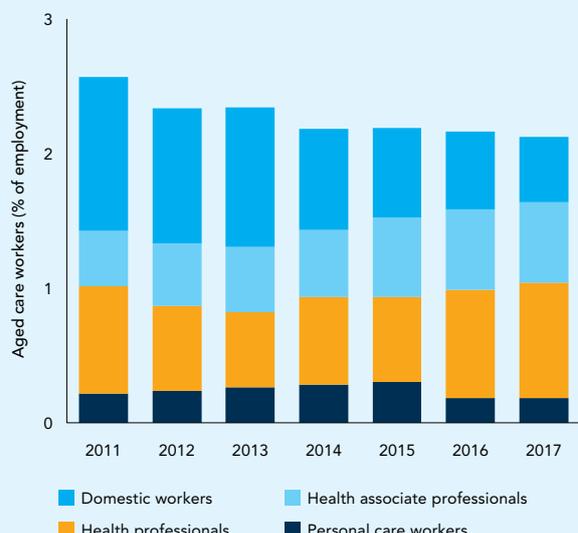
³⁴ Estimates for the size and composition of different types of aged care workers in Malaysia derived from the two-step procedure are by their very nature an approximation. For instance, the available data do not make it possible to differentiate between those domestic workers who are engaged in aged care and those who are not; nor can it be used to differentiate between various health professionals who are more likely (e.g. gerontologists) or less likely (e.g. pediatricians) to be aged care workers. Hence, information regarding the number of aged care workers in this report likely represents upper-bound estimates.

FIGURE 3.48: Aged care workers by occupation, Number ('000)



Source: Authors' calculations based on Labour Force Survey 2017 (DOSM).

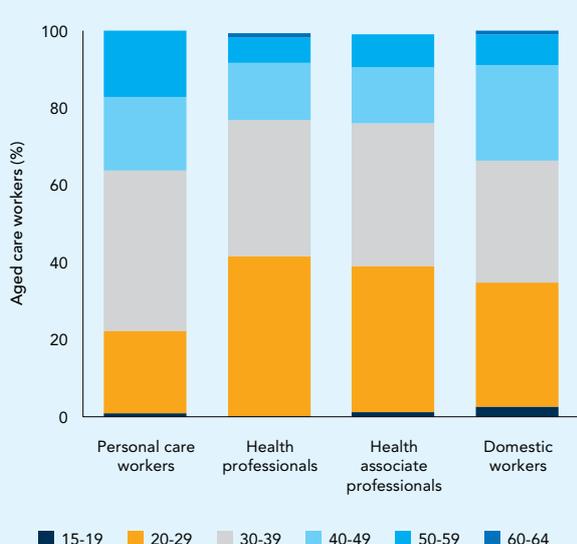
FIGURE 3.49: Aged care workers by occupation, Percentage of total employment



Source: Authors' calculations based on Labour Force Survey 2017 (DOSM).

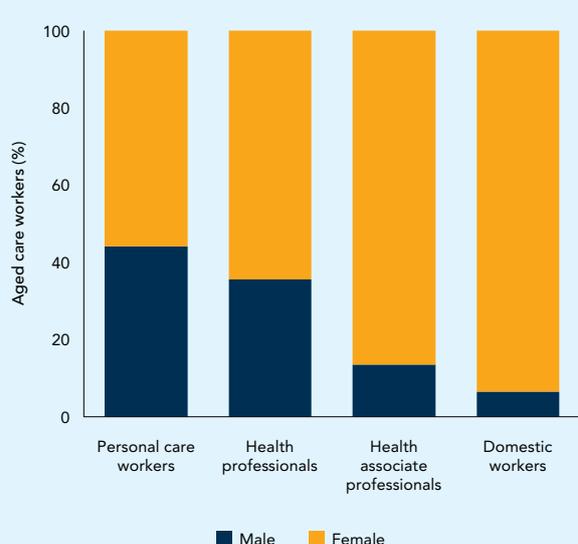
Nearly 40 percent of personal care workers and domestic workers engaged in aged care are at least 40 years old and above, and the large majority of aged care workers are women. Figure 3.50 shows that about 67.4 percent of aged care workers are between age 20 and 39. Accordingly, 32.6 percent of aged care workers are age 40 and above. Among personal care workers and domestic workers, nearly 40 percent are at least 40 years old. Also, the large majority of aged care workers are women. According to Figure 3.51, this is the case for 55.8 percent, 77.4 percent, and 93.6 percent of personal care workers, health workers, and domestic workers, respectively.

FIGURE 3.50: Aged care workers by occupation and age group, Percentage



Source: Authors' calculations based on Labour Force Survey 2017 (DOSM).

FIGURE 3.51: Aged care workers by occupation and gender, Percentage



Source: Authors' calculations based on Labour Force Survey 2017 (DOSM).

Many aged care workers and family members of older persons providing aged care services might lack the required skills and support. Figure 3.52 shows that 83.2 percent of personal care workers have at most secondary education, and 74.8 percent of domestic workers have at most primary education—raising concerns regarding whether these workers possess the necessary skills to provide quality aged care services. In addition, semi-structured interviews conducted for this report suggest that even trained nurses need support when they transition to become aged care workers (see Interview quote 3.6). The interviews also suggest that there is a lack of training available to enable family members caring for older persons to provide the appropriate care (see Interview quote 3.7). After stepping into their roles, some family members quickly realize that aged care is multi-faceted and requires skills in areas such as physiotherapy, diet and nutrition, and emotion management. The semi-structured interviews also suggest that some aged care workers experience high turnover, mental pressure, and limited opportunities for training and skill development (see Interview quote 3.8 and Interview quote 3.9).

INTERVIEW QUOTE 3.6

“I thought the transition would be a natural one. I was wrong. In private nursing or caregiving, we have to rotate the position of the (bedridden) patient to prevent “bed sores”. And all this is done alone, not with the help of a team. If a caregiver is not trained in working solo, they will resent the patient in the long run and the aged care recipient will suffer. You need a certain unique kind of person with a unique set of skills to provide aged care at homes. Personal care-giving is certainly different from traditional nursing.”

Source: 28-year old female, wage caregiver

INTERVIEW QUOTE 3.7

“After coming back from hospital, I don’t know what (food) to prepare for him, as he has a high index of diabetes. I think they can provide a program which teaches the caregiver on how to prepare the meals, which is a very good program. If the hospital is able to educate us before discharge from the hospital, then, everything will become easier after going back home.”

Source: 53-year old female, informal caregiver

INTERVIEW QUOTE 3.8

“...not all caregiver can last long being a caregiver. For example, people resign after 2-3 months, because they can’t take care of the emotion and all that. Not everyone is tough to be a caregiver.”

Source: 30-year old male, wage caregiver

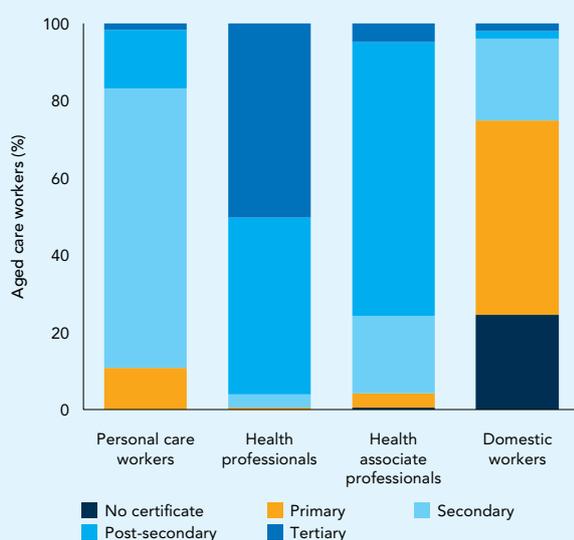
INTERVIEW QUOTE 3.9

“In terms of ways of taking care, if the welfare unit can organize the workshop and invite the relevant speaker to train on how to take care of elderly people or sickly people.”

67-year old male, informal caregiver

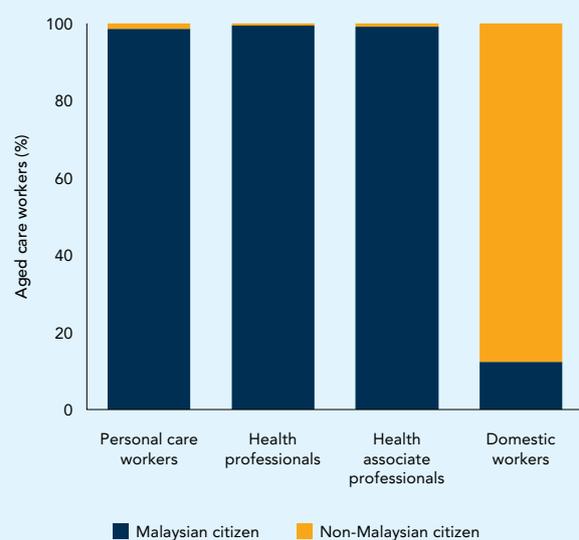
In principle, more demand-driven labor migration policies can help loosen the shortage of aged care workers and also foster broader policy goals. According to Figure 3.53, most personal care workers and health workers engaged in aged care are Malaysian citizens. In contrast, 93.6 percent of domestic workers are non-citizens.³⁵ This means that the decline in the number of domestic workers between 2011 and 2018 might be due to more restrictive immigration policies, rather than a lack of demand for aged care services (see KRI 2018). Conversely, more demand-driven immigration policies could at least in principle help loosen the shortage of aged care workers. In addition, this could also foster other policy goals such as increasing economic opportunities for women. World Bank (2019) finds that one of the main reasons that Malaysian women do not participate in the labor market is due to the need to perform household chores and caregiving while Tan and Gibson (2013) and KRI (2018) argue that the presence of a domestic worker in a household is positively correlated with female labor force participation. Thus, a larger supply of foreign domestic workers might enable more Malaysian women to participate in the labor market.

FIGURE 3.52: Aged care workers by occupation and education, Percentage



Source: Authors' calculations based on Labour Force Survey 2017 (DOSM).

FIGURE 3.53: Aged care workers by occupation and citizenship, Percentage



Source: Authors' calculations based on Labour Force Survey 2017 (DOSM).

Beyond domestic workers, labor migration of professional care workers can potentially contribute to improving the supply of qualified aged care workers. Even though the semi-structured interviews suggest that Malaysia faces a shortage of qualified aged care workers, current labor migration policies do not yet cater for the hiring of these care workers outside of the category of domestic workers (see Interview quote 3.10). Policies are particularly restrictive in the case of male care workers and not only limit supply but also act as a disincentive for internationally mobile workers. Again according to the interviews conducted for this report, many of these workers feel that the job title “domestic worker” or “maid” does not appropriately describe their professional skills and tasks (see Interview quote 3.11).

³⁵ Even this percentage should likely be regarded as a lower bound estimate for the share of domestic workers that are non-citizens, as foreign workers are likely to be underrepresented in data based on household surveys (see World Bank 2020).

INTERVIEW QUOTE 3.10

“For some reason, the government doesn’t recognize caregivers at the moment. There is no visa sector given as a caregiver. Immigration only has sector visa for maid, domestic helper and also agriculture. There are only 3-4 levels that are given. How are we to bring in male caregivers from Philippines if they (are) categorized as maids? We need them, Filipinos are trained and very professional caregivers.”

Source: 46-year old male, nursing home operator

INTERVIEW QUOTE 3.11

“I had to attend an 8-month intensive course where professional medical personnel taught us how to prepare specific combinations of medicines and administer medicine, do IV-tube feeding, draw blood, administer CPR, perform proper wound care and prepare food based of unique diet and nutrition. We (were) also taught the art of physiotherapy and massage. And when we arrived here, we continue with our training periodically when it is offered at the Philippines embassy. Many local Malaysian nurses are not well-versed with palliative care. This is a unique and specialized skill that Filipino caregivers are trained in before given their certification. So, we are not maids. And we should not be given a maid visa but a visa indicating our skill set. Which is professional caregiver.”

Source: 35-year old female, migrant wage caregiver

Malaysia has some way to go in developing demand- and supply-side policies that would chart and incentivize clear career pathways for care workers. On the demand side, formal accredited training for caregivers at aged care homes is not required by the Care Centres Act while the relevant regulations under the Private Aged Healthcare Facilities and Services Act have not yet been published. Hence, there is little incentive for aged care workers to invest in accredited training. On the supply side, even though aged care is one of the skills areas in the MOHR’s National Occupational Skills Standards (NOSS), the prevalence of relevant qualifications among aged care workers is unclear but likely low. While there are NOSS for Elderly Care Centre Operation, Elderly Care Centre Administration, and Elderly Care Centre Management, only training in Elderly Care Centre Operation is currently offered and at only one accredited center, according to correspondence with the Department of Skills Development (*Jabatan Pembangunan Kemahiran* or JPK). Whereas the curriculum from NOSS indicates that the training covers care handing, activities for independent and dependent residents, reception of new residents, housekeeping, security, emergencies, and end-of-life issues, it is also unclear if all necessary technical skills are included (see Interview quote 3.12). Finally, there are no dedicated policies for career development of care workers, as well as insufficiency in data and statistical systems for human resources planning, development, and monitoring and evaluation.

INTERVIEW QUOTE 3.12

In Malaysia, the training for nurses is not a comprehensive one. There is a lack of focus on caregiving and palliative care.

Source: 28-year old female, wage caregiver

Governance of Private Sector Providers

With the acceleration of aging, the private sector and NGOs have started to participate in the provision and financing of aged care services. In recent years, private service providers have been exploring various service delivery models such as home-based services, daycare centers, care and nursing homes, retirement villages, and even using online platforms for home-based care services. The increased private sector activity is a welcome sign for the development of Malaysia's aged care sector. However, policy and institutional reforms are needed to make business models viable, scalable, and financially sustainable while at the same time assuring high-quality and inclusive provision of care.

Various government agencies are involved in the regulation of private aged care service providers. JKM, MOH, local authorities, and the Fire and Rescue Department are all involved in regulating private (for-profit and not-for-profit) residential aged care facilities. The aged care governance framework is currently also in transition following the passing of the Private Aged Healthcare Facilities and Services Act in 2018. New regulations and guidelines which will cover the specific requirements and standards are currently under development. At least until this work is completed, regulations are oftentimes interpreted differently by different local governments and there is also a lack of clarity regarding the regulation of aged care homes run by religious associations.

Strengthening policy coordination, improving the licensing process, and leveling the playing field across space and across service providers could lead to large gains in equity and efficiency. Critically, an estimated 1,400 residential aged care centers are unlicensed compared with 320 licensed centers. This is likely at least partly due to an often complicated, prolonged and costly licensing process and a varying complexity of licensing requirements across space (see Box 3.5). Specific difficulties frequently reported by operators include (i) the necessity of obtaining approval from neighbors, (ii) costs involved in complying with standards, particularly fire-related standards, (iii) costs involved in converting residential land titles to commercial land titles, and (iv) the need to obtain approval from multiple ministries and agencies, who may have differing requirements and standards. Difficulties in licensing limit the potential growth of the aged care sector and provide opportunities for rent-seeking. In addition, they encourage many aged care centers to remain unlicensed and therefore potentially weaken the protections of older persons. As already mentioned, this is a critically important issue during a crisis such as the COVID-19 pandemic (see Wang et al 2020).

In addition to for-profit private providers, NGOs including civil society organizations, charities, foundations and associations play an important role in aged care policy formulation, provision and financing. There are many NGOs that provide aged care services, financed either through donations or commissioned by the government. For instance, JKM or MOH have earmarked funds for NGOs to run specific activities or programs. In addition, many NGOs have contributed to aged care policy formulation as members of the National Advisory and Consultative Council for Older Persons. NGOs have also been partners in the implementation of the National Policy on Older Persons. Overall, the strong role of NGOs is an important asset as Malaysia develops its aged care sector.

When NGOs are commissioned to provide aged care services, payment and management arrangements tend to be rigid and to focus on inputs and processes instead of results. For example, the annual operational grant for a PAWE must be used in accordance with very specific guidelines issued by JKM (see JKM 2018). These guidelines cover areas such as the governance, management, and programs expected from the PAWE. The guidelines state that a registered society is the preferred entity responsible for managing the PAWE as it makes it possible to raise additional funds from other sources while imposing

BOX 3.5

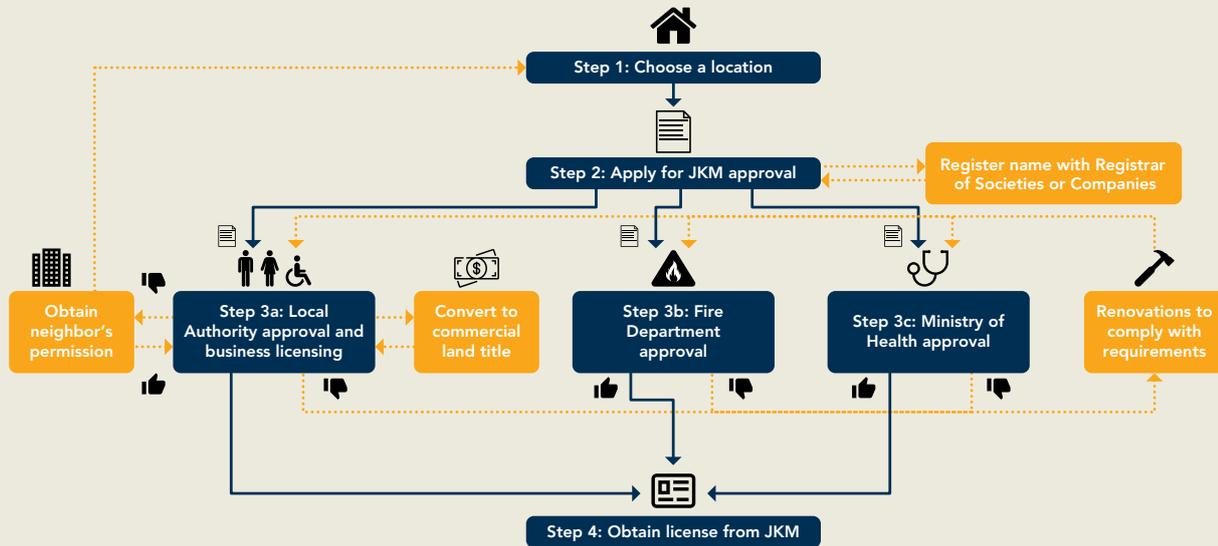
Licensing of private residential aged care centers

Under the Care Centers Act, the typical process (which can vary by local authority) for applying for a license for a private residential aged care center consists of four steps (see Figure 3.54):

- **Step 1 – Choose a location:** The applicant identifies a location and proposes a name for an aged care center. Local authorities and/or JKM may have varying requirements or guidelines regarding permissible locations. These might include the designation of spatial zones, specific rules on the density of aged care facilities within a particular area, or explicit preferences for the type of housing, such as landed residential lots in residential areas or the conversion of a residential title to commercial property (to be done during Step 3). There might be more flexibility if the applicant is a nonprofit entity.
- **Step 2 – Apply for JKM approval:** The applicant submits an application to the district-level JKM office stating the location and proposed name(s) of the aged care center. The proposed name(s) have to be cleared with the Registrar of Societies or Registrar of Companies (depending on the type of applicant). Once the location and name have been cleared by JKM, JKM will then issue several letters to be used to seek approval from other agencies in Step 3.
- **Step 3 – Apply for approval from the local authority, the Fire and Rescue Department, and MOH:** The applicant seeks approval in parallel from: (i) the local authority, which consults with neighbors to get their no objections (the applicant is given an opportunity to address concerns), decides if rules concerning the automatic convertibility of other types of care centers such as childcare or daycare centers apply, decides if a conversion of the land title from residential to commercial is required (which can require a substantial fee), and determines if technical aspects such as the width of bathroom doors and accessibility are in line with applicable standards; (ii) the Fire and Rescue Department to ensure compliance with the fire code; and (iii) MOH, for enforcement of relevant environmental and sanitary requirements.
- **Step 4 – Obtain license from JKM:** Once all approvals by the local authority, the Fire and Rescue Department, and MOH have been obtained, the applicant can return to JKM to pay a small fee and obtain the license.

The overall licensing process can take six months to two years and involve substantial expenditures, particularly to convert a land title from residential to commercial and to renovate the facility to comply with applicable standards. Requirements may also be interpreted differently by the different agencies responsible for regulating aged care centers, thus adding to uncertainty and costs.

FIGURE 3.54: Typical licensing process for a private residential aged care center



Source: Authors.



a more formal management. Guidelines also include details on the precise roles of each member of the management committee and the staffing of the PAWE by a part-time administrator and two part-time assistant administrators. Salaries are fixed at RM600 per month for the part-time administrator and RM400 per month for the assistant part-time administrators. An operational grant of RM33,330 per year is applied uniformly to all PAWE, regardless of actual costs or outputs delivered. One-off seed funding is also fixed at RM100,000 (previously RM80,000). Similarly, home help services commissioned from NGOs are paid on a cost reimbursement basis—fixed for each home visit—which results in a heavy administrative burden and focus on inputs instead of results. Detailed monthly reporting of activities is required and frequently done manually.

There is room for improving the regulatory oversight of not-for-profit providers and the monitoring and evaluation system for quality improvement. Currently, there are some checks of the services commissioned by the Government, but there is no robust system to hold not-for-profit providers accountable for the quality of services delivered. The wide range of home and community-based services provided in varied settings creates additional challenges for quality monitoring. A more robust monitoring and evaluation system could facilitate regulatory oversight. Ideally, the system should also enable monitoring of the care needs of older persons and produce data that could be used for care planning and quality improvements. More broadly, Malaysia has no unified information system that collects and keeps data on both public and private providers of aged care services and there is only limited data sharing across ministries and agencies. In addition, aggregate information is available only for basic indicators (such as the number of beneficiaries and their demographic profile). Even this information is sometimes only partial, and data collection is frequently paper-based and manual. Monitoring and evaluation systems are also fragmented across programs and between the federal and state levels.

Malaysia can learn from international experiences and practices on how to establish an inclusive aged care system to meet the increasing needs of older persons. Both OECD and some developing countries, such as Thailand and China, have introduced a mix of demand- and supply-side interventions and innovations in the area of aged care. This has included service expansion, regulatory measures and financial incentives to promote the development of home- and community-based care services as opposed to residential aged care. This shift at least partly reflects older persons' changing preferences. In addition, home- and community-based aged care services are on average more cost-effective. Other innovative measures that Malaysia could study include training and wage incentives for human resources development, case management to promote integrated care and continuum of care between the social and health sectors, branding and franchising for service expansion to ensure quality of services, and financing innovations. Finally, in many countries the government has moved toward purchasing aged care services from private providers, outsourcing public aged care facilities to private operators, thereby fostering social and private sector participation. Many countries have also adopted a more results-based financing approach (see Box 3.6).

Developing the aged care sector could become a new driver of economic growth in Malaysia. As discussed in Chapter 1, aging in general and aged care more specifically offer opportunities for both a booming silver economy and a more inclusive society. To realize these opportunities, policy actions and institutional reforms are needed to remove institutional barriers. In addition, the introduction of mechanisms that smartly use public financial resources as “seed money” will foster and mobilize social and private investment. This in turn can contribute to making the aged care sector an engine of economic growth and job creation.

BOX 3.6

Developing public-private partnerships (PPP) in the aged care sector

A PPP is a long-term contract between a private party and a government entity, for providing a public asset or service, in which the private party bears significant risk and management responsibility, and remuneration is linked to performance. PPPs can be used to provide for both new and existing public assets or services and the private party can either be paid entirely by the users of the services, or a government entity can make some or all of the payments. A PPP usually covers cases where there is a public interest in the provision of the relevant assets or services.

A comprehensive PPP framework typically has five components: *First*, a policy—an articulation of the rationale behind the Government’s intent to use PPPs to deliver public services, and the objectives, scope, and implementing principles of the PPP program. *Second*, a legal framework—the laws and regulations that underpin the PPP program, enable the Government to enter into PPPs, and set the rules and boundaries for how PPPs are implemented. *Third*, processes and institutional responsibilities—the steps by which PPP projects are identified, developed, appraised, implemented, and managed, and the roles of different entities in the process. *Fourth*, a public financial management approach—an approach on how fiscal commitments under PPPs are controlled, reported, and budgeted for, to ensure PPPs provide value for money, without placing undue burden on future generations, and to manage the associated fiscal risk. *Fifth*, other arrangements—covering how entities other than the government such as auditors, the legislature, and the public participate in the PPP program, and how they are able to hold those responsible for implementing PPPs accountable for their decisions and actions.

Many countries use commissioning to purchase aged care services from the private sector or outsource the operations of public aged care facilities to best use available resources, improve efficiency, and maximize outcomes. This type of approach also relies on a partnership between the Government and the private sector, but of a different form than a classic PPP with a long-term contract. There are different models in commissioning aged care services. An approach that is based on strategic planning and outcome-based in the sense of linking resource allocation with meeting assessed needs is best practice. It is also best practice to use evidence to assess needs and make spending decisions, rather than to allocate funding on the basis of historical spending and inputs-based approaches. Regardless of contract type, transparency and a good governance structure have proven to be crucial for maximizing value for money.

Source: Authors based on Center for Effective Services (2015) and World Bank (2017b).



CHAPTER 4

Conclusions and Recommendations

The year 2020 marks a crucial milestone in Malaysia’s history as it becomes an aging country.

Henceforth, the country will age rapidly with the share of the population age 65 and above projected to double from 7 percent to 14 percent within only 24 years. This rapid aging process will have a profound impact on Malaysia’s development trajectory, raising various policy challenges and risks but also offering opportunities. Macroeconomic projections indicate that aging will account for about a third of the decline in Malaysia’s economic growth between 2020 and 2050. Equally important, there will be rising challenges with regard to providing productive and inclusive health, pension, and long-term care systems. Nevertheless, while impending demographic changes are critical and will become even more so in coming decades, demography is not destiny. Through the right mix of policies, the Government of Malaysia can help the country adapt to rapid aging and improve the well-being of all Malaysians. In fact, aging presents not only challenges but also opportunities. For instance, harnessing the productive potential of older workers can help address persistent talent shortages while the aged care sector can become a new driver for economic growth, create job opportunities, improve the quality of social services, and contribute to an improved quality of life. Both the challenges and opportunities created by aging are becoming even more crucial as Malaysia is likely to transition to a high-income economy within the next few years, and the aspirations of its expanding middle class regarding jobs, income, and well-being continue to grow (see World Bank forthcoming).

An integrated, interagency policy approach can address challenges and constraints in a systematic and mutually reinforcing way.

Reducing or ending some of the barriers to productive and inclusive aging identified in this report will require clear prioritization and finely calibrated policy approaches. For instance, enhanced opportunities for training and lifelong learning can help mitigate the impacts of aging on economic growth; specific parametric changes by EPF can improve the adequacy of EPF members’ retirement income; and selective increases in public financing for aged care services can help address unmet aged care needs. At the same time, many of the recommended policy approaches will address more than one barrier and different approaches will be mutually reinforcing. For instance, an increase in the minimum retirement age to 65 can not only improve employment opportunities for older workers, but also foster old-age income security. In addition to that, more productive and inclusive aging is necessarily a cross-sectoral endeavor; some of the most crucial policy approaches will require cooperation between different ministries and agencies. Maybe most strikingly, strengthening the governance of the aged care sector will necessitate cooperation between MOH, JKM, the Fire and Rescue Department and State and Local Governments,



among others. Therefore, a systematic and integrated interagency approach to the promotion of productive and inclusive aging—as well as one that adopts a life cycle perspective, mainstreams approaches to address the specific constraints faced by women, and is mindful of political economy considerations—will have the most pronounced and sustainable impact. Ideally, this approach would be guided by an integrated strategy and supervised by a steering committee.

The promotion of productive and inclusive aging will require policies that foster the productive employment of all workers, provide minimum income protection to all older persons, and build an inclusive aged care system. General policy directions as well specific short-term, medium-term and long-term policy options are laid out in Table 4.1, with the caveat that this distinction is not always entirely clear-cut and that for some of the long-term policy options to be effective, implantation needs to begin in the short or medium term. With aging, Malaysians will have to work longer. This will need to be reflected in gradual adjustments to the minimum retirement age and EPF minimum withdrawal age, among other policy parameters. In parallel, policies are needed that foster workers’ productive employment—such as enhanced opportunities for training and lifelong learning. In addition, the provision of minimum income protection of older workers will require improvements in the coverage and adequacy of social insurance schemes, as well as the introduction of a modest, broadly targeted tax-financed social pension. Finally, for the aged care sector to become a new driver of economic growth, it will be crucially important to create an enabling market and regulatory environment for private aged care provision, to strengthen the governance of the sector, and to selectively increase public financing in line with available fiscal space.

TABLE 4.1. Overview of policy recommendations

General Policy Directions	Short-term Policy Options	Medium-term Policy Options	Long-term Policy Options
1 Foster the productive employment of all workers, including older workers.	Provide enhanced opportunities for training and lifelong learning.	Develop regulations for older workers’ productive and flexible employment.	Gradually raise the min. retirement age to 65; link it to life expectancy at retirement thereafter.
	Facilitate the adoption of age-management strategies by companies.	Improve women’s economic opportunities through better childcare and other measures.	Consider piloting incentives to encourage the employment of older workers.
2 Provide minimum income protection to all older persons.	Develop an integrated vision of a system for old-age income protection.	Introduce a modest, broadly targeted tax-financed social pension.	Adjust the minimum withdrawal age for EPF Account 1 and rethink the role of Account 2.
	Broaden EPF coverage to more of the self-employed and informal sector workers.	Establish a one-stop shop for EPF, SOCSO and HRDF contributions.	Explore annuitization options and longevity insurance for EPF balances.
3 Build an inclusive aged care system.	Develop a systematic and actionable aged care strategy based on a solid assessment.	Streamline and harmonize licensing requirements for aged care facilities.	Upgrade skills of aged care workers through strengthened training arrangements.
	Improve quality standards of aged care homes to ensure health and safety.	Strategically reorient public financing toward home and community-based aged care.	Selectively increase public financing to incentivize market-oriented care provision.

POLICY DIRECTION 1 Foster the productive employment of all workers, including older workers, through a comprehensive set of demand- and supply-side policies.

Short-term policy options

- Provide enhanced opportunities for training and lifelong learning across the life cycle, including to older workers.** Upskilling and reskilling are important to ensure that all workers, including older workers, are able to obtain the skills required to continue working against the backdrop of rapid technological advancement and the COVID-19 pandemic, which has accelerated secular trends in changing skills demand (see World Bank 2020). According to the World Bank's LTGM, improving the human capital of Malaysia's workforce can also help mitigate the negative impact of aging on economic growth (see Box 4.1). Older workers who are provided with opportunities to upskill and reskill will be more likely to remain productive for longer, and will be able to transition to jobs that are less physically demanding and more flexible. While there are typically no age limits to existing training programs, World Bank (2017c) shows that employers registered with the Human Resource Development Fund (HRDF) are more likely to train younger workers than older workers. As such, it is worthwhile highlighting the importance of continued and improved access to training for older workers. In turn, this objective could for instance be fostered through dedicated a strategic initiative through HRDF. Any such strategic initiative would benefit from including those without standard employment contracts and taking into account their specific circumstances such as their generally relatively low level of education.³⁶
- Encourage and facilitate the adoption of age-management strategies by companies, encompassing work organization, work equipment, working time policies, and training.** Given that some older workers develop physical limitations, many countries have sought to adjust the physical work environment to enhance their productivity (see World Bank 2016). A holistic age-management strategy encompasses work organization, work equipment, working time policies, and training, among other aspects. While age-management strategies are largely the domain of companies, the Government can foster awareness and uptake by issuing guidelines on the types of strategies that can be undertaken, including examples of the types of technologies that can be utilized to maximize the productivity of older workers. Another way to raise awareness is to grant awards or prizes for the implementation of age-management strategies, similar to TalentCorp Malaysia's Life at Work awards that recognize employers with progressive workplace strategies. Finally, the Government could consider limited financial incentives, such as grants to employers for workplace adjustments, including investments in the relevant technology. Financial incentives could be introduced for a limited period of time to encourage employers to pilot age-friendly workplaces, and could be directly tied to requirements related to the hiring or retaining a predetermined number of older workers for a specified period of time.

Medium-term policy options

- Develop a regulatory framework for the productive and protected employment of older workers and facilitate part-time and other flexible forms of employment.** Japan and Singapore have introduced regulations that require employers to retain employees beyond the legal retirement age. While a mandate might not necessarily be required, Malaysia could consider developing a regulatory framework for the employment of older workers that would define conditions of employment, such as

³⁶ World Bank (2017c) also demonstrates that, on average, HRDF-registered firms are more likely to offer training, and to train a higher share of workers than non-HRDF-registered firms. Therefore, older workers would likely benefit from policies that expand HRDF coverage to sectors where training rates are low and sector-based training bodies are insufficient, as recommended by World Bank (2017c).

access to social protection benefits and remuneration in a more comprehensive and systematic way than is currently the case. In addition, Malaysia could reinforce measures that facilitate flexible forms of work, including through the pursuit of relevant enabling provisions as part of the planned amendments of the Employment Act, as well as the Employment (Part-time Employees) Regulations. Statutory approaches to flexible work arrangements that could be considered include protecting staff with flexible work arrangements against potential discrimination (see World Bank 2019b). Part-time work is often cited as the most important flexible working arrangement and has been formally regulated in Malaysia since 2010.³⁷ Moving forward, the definition of part-time workers could be broadened and for instance, allow for work from home.

- **Improve women’s economic opportunities through better availability, quality and affordability of child care, reforms of the legal environment and improved support for parents in line with international legal norms, and policies that address gender norms and attitudes.** In addition to investments in human capital, the LTGM also shows that an increase in Malaysia’s female labor force participation rate could boost average GDP growth (see Box 4.1). In addition, not addressing the specific constraints to labor market participation that women face while implementing other policies to foster productive employment might exacerbate existing gender imbalances in Malaysia’s labor market. Against this backdrop, World Bank (2019b) provides a comprehensive analysis and policy recommendations toward better economic opportunities for women in Malaysia. Specific policy recommendations include better availability, quality and affordability of child care, reforms of the legal environment and improved support for parents in line with international legal norms, and policies that address gender norms and attitudes. In addition, it is also important that all other policies to foster productive employment take into account specific constraints of older female workers, such as relevant care burdens. Thus, it would for instance be recommended for training programs to offer support to female beneficiaries in terms of child and aged care needs.

Long-term policy options

- **Gradually increase the minimum retirement age to 65, and thereafter link it to life expectancy at retirement.** A higher minimum retirement age is expected to act as a strong signal to both employers and employees, thereby increasing the employment rate at older ages (see Geppert et al. 2019). In turn, this will help mitigate at least some of the impacts of aging on growth. The minimum retirement age should not be abruptly increased. Instead, the transition process should be well-considered, well-communicated and inclusive. For instance, the transition to a minimum retirement age of 65 could happen over a period of ten years and include the provision of transparent and clear information, coupled with inclusive consultations. This could build societal awareness and consensus, and thus at least partly mitigate some of the political economy challenges that are to be expected. After the minimum retirement age reaches 65, it could be linked to life expectancy, which is projected to increase further in the future. Linking the minimum retirement age to life expectancy will remove the need for recurring discretionary policy revisions. Over the medium term, more consistency between the minimum retirement age, the mandatory retirement age for civil servants, the EPF minimum withdrawal age and other social insurance parameters (see below) would be desirable.

³⁷ The Employment Act defines a part-time employee as a person who has entered into an employment contract or a contract of service with an employer, does not earn more than RM2,000 per month, and whose average hours of work per week are more than 30 percent but do not exceed 70 percent of the normal hours of work per week of a full-time worker employed in the same capacity by the same employer or 48 hours. It does not cover employees who are engaged occasionally or whose working hours in one week do not exceed 30 percent of the normal working hours of a full-time employee in one week and employees who are working from their own residence.

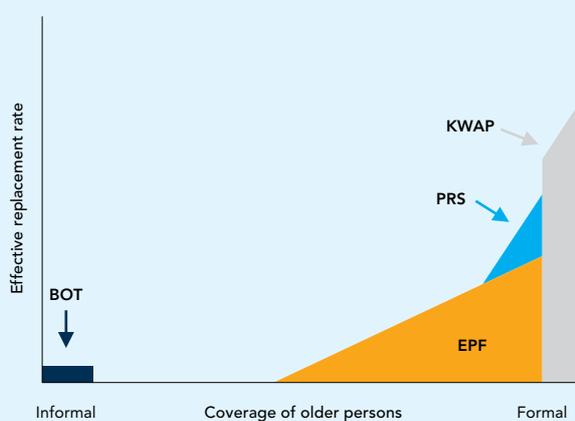
- Consider piloting financial incentives to encourage the employment of older workers, such as targeted, conditional, and time-bound wage subsidies.** Wage subsidies are a common instrument for offsetting gaps between the pay and (perceived) productivity of older workers, and can be effective in promoting reemployment when they have strict eligibility criteria and are carefully implemented (see OECD 2019). They can be particularly worthwhile following the labor market crisis created by COVID-19. It may be advisable to limit eligibility to a relatively narrow age group, for example age 55 to 65, and to those who have been unemployed and actively looking for a job for more than a year, as documented through EIS records or similar means. The wage subsidies should ideally also be time-bound. Finally, strong monitoring and evaluation arrangements should ensure its effectiveness in boosting employment among older workers in a cost-effective manner while not hurting other groups of workers.

POLICY DIRECTION 2 Provide minimum income protection to all older persons through increased coverage and adequacy of savings and social insurance schemes, as well as a modest, broadly targeted tax-financed social pension.

Short-term policy options

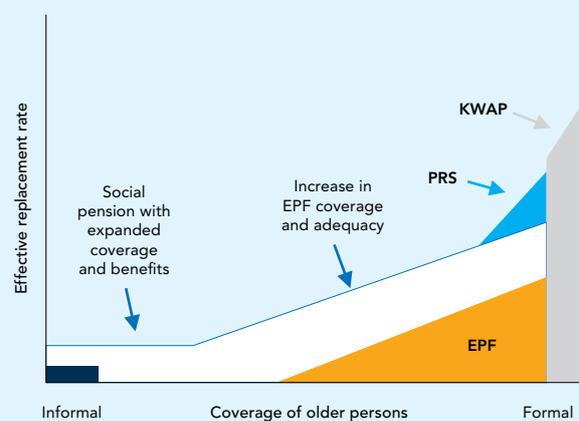
- Develop an integrated vision of a system for old-age income protection, encompassing strengthened mandatory and voluntary retirement savings schemes and a substantially stronger role for tax-financed social assistance that provides minimum protection to all.** Strengthening old-age income protection will require a substantial effort as well as an integrated vision of measures to strengthen mandatory and voluntary retirement savings schemes. This should be coupled with a substantially stronger role for tax-financed social assistance to poor or vulnerable older persons. In other words, the core objective would be to improve the adequacy and coverage of old-age income protection arrangements for all (see Figure 4.1 and Figure 4.2). An integrated vision could unite multiple schemes to address the diverse needs and circumstances of the population both working and in retirement. It could also provide a common framework for the more detailed instruments and incentives that would be needed for the self-employed, informal and gig-economy workers, workers in the agricultural sector, and other specific groups.

FIGURE 4.1: Stylized representation of coverage and adequacy of old-age income protection based on current setup



Source: Authors.

FIGURE 4.2: Stylized representation of coverage and adequacy of old-age income protection based on integrated vision



Source: Authors.

BOX 4.1

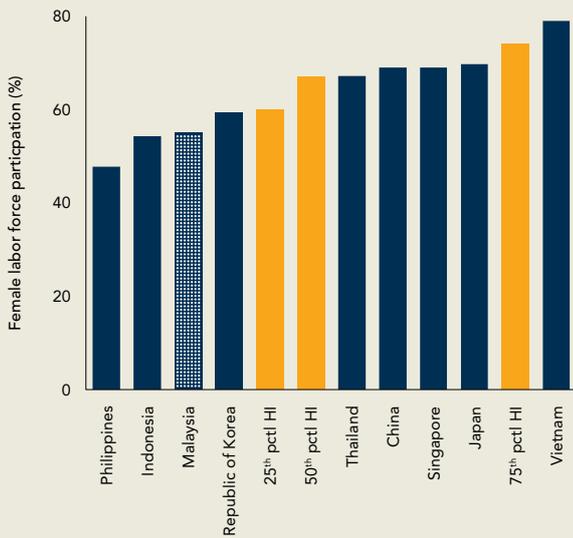
Mitigating the macroeconomic impacts of aging

Policies that increase the female labor force participation rate and improve the quality of human capital can help mitigate the impacts of aging on economic growth in Malaysia. Simulations using the LTGM introduced in Section 2.2 show that policy measures to increase the size of the labor force in Malaysia, including by closing the gap between female and male labor force participation rates, can boost long-term GDP growth. Additionally, term GDP growth can be increased through measures that build the human capital of the labor force such as improvements in the quality of basic education, increases in the educational attainment and health of future generations, and training to reskill and upskill the existing workforce, including older workers.

Based on projections using the LTGM, an increase in the female labor force participation rate to the 25th to 75th percentiles of high-income economies would boost average GDP growth between 2020 and 2050 by up to 0.36 percentage points. Despite a substantial increase in recent years, Malaysia's female labor force participation rate still lags behind high-income comparators and regional peers like Thailand, China and Singapore (see Figure 4.3 and World Bank 2019b). Against this backdrop, three possible reform paths for female labor force participation are worth considering. In the weak, moderate and strong scenario the female labor force participation increases to the 25th, 50th, and 75th percentiles among high-income countries, respectively. The length of the adjustment period is based on the historical experience of representative high-income countries and adjustment is assumed to continue linearly thereafter (see Figure 4.4). For the weak reform scenario, it takes 27 years for Malaysia to increase the female labor force participation rate from 55 percent to 62 percent, which increases average GDP growth from 2020 to 2050 by 0.14 percentage points. Under the moderate reform scenario, it takes 23 years to increase the participation rate to 69 percent, which increases average GDP growth by 0.31 percentage points. In the strong reform scenario, it takes 27 years to increase the participation rate to 74 percent. This increases average GDP growth by 0.36 percentage points.

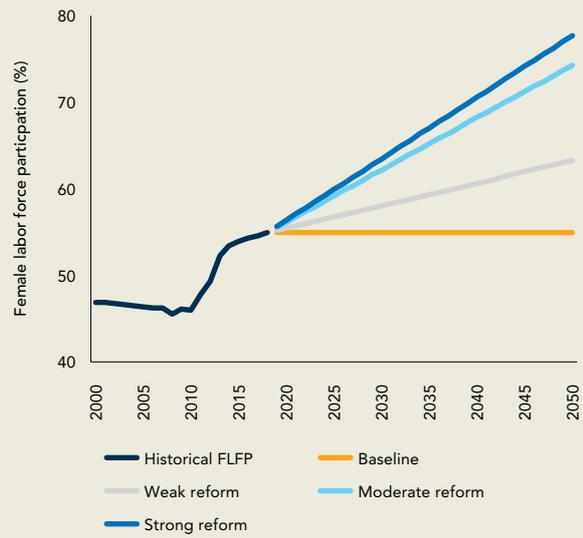
Raising the human capital of the workforce can also help to mitigate the negative impact of its shrinking size on economic growth. In the LTGM's baseline scenario, Malaysia's annual growth rate in human capital—measured as a composite of various indicators such as the quality of basic education and the health of the workforce—is projected to fall from 0.6 percent in 2020 to 0.1 percent by 2050. However, reforms that increase all components of human capital to their 50th percentile in the distribution of high-income economies could practically stabilize the growth rate in human capital at 0.7 percent in 2050 (see Figure 4.5). While these reforms on their own could only partially offset the decline in Malaysia's long-term growth due to aging (in contrast to findings for other countries by Bloom, Prettner and Strulik 2013 and Lee and Mason 2010), they would nevertheless be expected to have a significant positive long-term impact. A comparison of baseline projections and the alternative scenario—that assumes an increase in all components of human capital to their 50th percentile in the distribution of high-income economies—demonstrates that in the baseline scenario headline GDP growth would fall to 1.8 percent in 2050. In the alternative scenario, it would be 2.5 percent (see Figure 4.6).

FIGURE 4.3: Female labor force participation rate by country and country group, Percentage



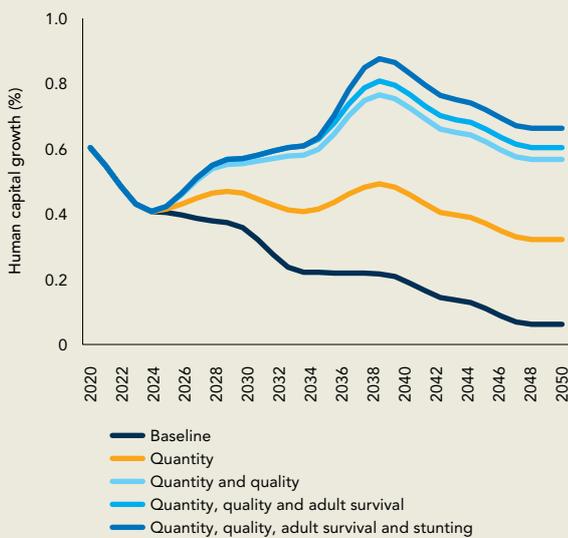
Source: Authors' calculations based on World Bank World Development Indicators.
 Note: 25th pctl. HI refers to the 25th percentile among high-income countries and similarly for 50th pctl. HI and 75th pctl. HI.

FIGURE 4.4: Baseline and alternative projections for female labor force participation rate, Percentage



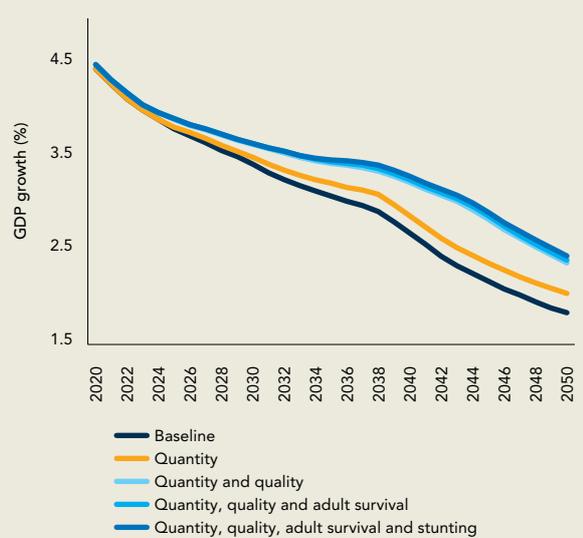
Source: Authors' calculations based on LTGM.

FIGURE 4.5: Baseline and alternative projections for growth in human capital, Percentage



Source: Authors' calculations based on LTGM.

FIGURE 4.6: Baseline and alternative projections for headline GDP growth rate, Percentage



Source: Authors' calculations based on LTGM.

- **Broaden EPF coverage, including through a mandate or default opt-in for the self-employed, improved oversight and reporting, cooperation with industry associations, stronger linkages between EPF and SOCSO, and increased tax-financed matching contributions.** Several complementary measures could be implemented to increase the proportion of workers actively contributing to EPF. *First*, the scope of contributors could be broadened to cover the self-employed, farmers and employment insurance beneficiaries. The self-employed could either be required to contribute or be governed by a default option whereby all are registered with EPF when they register with the Companies Commission or the Inland Revenue Board but can opt-out in writing. *Second*, oversight could be improved, including through a requirement for the registration of all workers as a condition for the granting of employers' business licenses or Government contracts. Compliance monitoring could also be improved using a risk-based approach that prioritizes types of firms more likely to be noncompliant, as well as select auditing of wage reporting to EPF and the Inland Revenue Board. *Third*, cooperation with industry associations and other aggregators such as gig economy platforms could be encouraged or mandated. *Fourth*, linkages between EPF's *i-Saraan* scheme and SOCSO's Self Employment Social Security Scheme could be strengthened. *Fifth*, the matching contribution in the *i-Saraan* scheme could be increased to create a stronger incentive. Box 4.2 shows that matching contributions can provide a powerful incentive to informal workers to save for old age but that design features are crucial. *Sixth*, strengthened seminars, web-based information, and learning tools such as retirement calculators can increase the public awareness of the importance of savings for retirement.

Medium-term policy options

- **Introduce a modest, broadly targeted tax-financed social pension to ensure minimum old-age income protection for all based on a careful study of design options weighing the size of the target population, the benefit level, incentives for EPF participation, and fiscal costs.** As discussed in Section 3.2, in principle, a social pension could either be targeted at all those above a certain age, restricted to those with insufficient income or EPF balances, or provided as a supplemental benefit for those in households qualifying for other social assistance. In the short or medium term, one practical option would be to introduce a relatively modest social pension of the same benefit level as BOT of RM350 per month targeted at the B40 age 65 and over and using the BSH implementation system. Projections indicate that the introduction of this benefit would cost about 1.6 percent of projected fiscal revenues in 2020, with increases in line with the growth in the population age 65 and above thereafter.³⁸ Over time, the social pension's coverage or adequacy could be expanded in line with available fiscal space. For instance, the benefit level could be increased over time to 30 percent of the median wage while the coverage could gradually approach a larger and larger share of the population age 65 and above (though at a considerably higher cost).
- **Strengthen work injury, disability and survivorship insurance through parametric changes to SOCSO's relevant schemes, further expansion of protection to informal workers, and the establishment of a one-stop shop for EPF, SOCSO and HRDF contributions.** Strengthening protection against disability and death could include the alignment of SOCSO's retirement age with EPF's minimum withdrawal age. In addition, all SOCSO benefits could be automatically indexed to inflation and a "no-fault injury coverage" could be adopted, thereby effectively extending coverage of accidents 24/7. Adjustments in other relevant parameters could be studied, including the minimum benefit, constant attendant allowances (paid to SOCSO members so severely incapacitated that they require the constant personal attendance of another person), maximum insurable earnings, and possibly the contribution

³⁸ Without improvements to the targeting performance of BSH, the estimates for coverage and fiscal costs of the social pension are likely to be lower bounds.



rate (to assure it remains actuarially fair). SOCSO's expansion of employment injury protection to some informal workers has been an important initiative to increase coverage. This initiative could be further expanded to other groups of informal workers, as intended, and further strengthened by measures to incentivize registration and compliance including auto-enrollment (similar to the recommendations for EPF above). Finally, to reduce the administrative burden of contributions, a one-stop shop could be established which unifies the contribution collections for EPF, SOCSO, and HRDF. Such a one-stop shop could then distribute earmarked contributions to each of the respective institutions. This would reduce the burden on individual employers and make it easier for the self-employed or informal workers to participate.

Long-term policy options

- Gradually adjust the minimum withdrawal age for EPF Account 1 from 55 to 65, perhaps over a 10- or 20-year period, and consider converting EPF Account 2 to retirement savings.** There is a need for measures to increase the contribution histories of workers who are active EPF members to ensure that retirement savings could be sustained for a longer period of time. *First*, the minimum withdrawal age for EPF Account 1 could be gradually increased from 55 to 65, perhaps over a 10- to 20-year period. This would substantially increase accumulated balances and create incentives for individuals to work longer. In the long run, the age for benefit eligibility might need to be further increased beyond 65, in parallel with Malaysia's increasing life expectancy. *Second*, consideration could be given to converting contributions to EPF Account 2 to retirement savings. Before such a step is taken, it would be necessary to evaluate whether there still is a continued rationale for having a mandatory savings program for housing, education and health. *Third*, the EPF contribution rate could be reduced as the benefit eligibility age increases, provided that there is an observed increase in coverage and adequacy for most workers. Also, a cap on

BOX 4.2

Expanding pension coverage by offering matching contributions

Achieving broad pension coverage and adequate levels of income protection in old age remains an elusive goal for nearly every country. In general, there is a strong relationship between the level of per capita income and participation in formal pension systems. However, there are considerable differences among countries at similar levels of development in pension coverage and in the way in which participation in pension systems has evolved in different settings. The differences in experiences and outcomes indicate that context, the design of the system, and the path of its development play a central role in the dynamics of pension coverage and benefit levels.

A growing number of countries aim to increase coverage and provide a retirement benefit to informal workers through matching contributions. Those contributions provide tangible incentives for individuals to participate in pension funds, rather than the traditional approach of mandating participation and providing preferential tax treatment for retirement-account contributions. That is especially true for low-income groups and individuals who may not participate in the formal labor market and therefore receive no advantage from tax-based incentives. In principle, matching



contributions may be provided for public programs or by the sponsors of private occupational plans offered by insurance companies or the like. In practice, nearly all current examples are associated with individual retirement savings accounts.

There is consistent empirical evidence that matching participants' contributions to retirement savings can be effective in increasing participation. The evidence from high-income countries indicates positive but modest effects of matching on participation, with overall effects increasing participation in the range of 5 to 10 percent of potential beneficiaries. The associated finding that a 25 percent match of individual contributions is associated with about a 5 percent increase in participation appears robust. That magnitude is also broadly consistent with results from the Republic of Korea, where a 50 percent match for farmers and fishers increased the probability of their making a pension contribution by 7.4 percent. In New Zealand, a large initial match—a significant element of the *KiwiSaver* system—elicited enrollment from many people with little or no earnings, providing further evidence of the potential effectiveness of significant matches.

The structure of the match—the matching rate, thresholds, and caps—has significant consequences for its effect on the saving rate. The match threshold seems to have a greater impact than the matching rate. Providing a lower match, for example, of 25 percent on contributions, of up to 10 percent of pay (a relatively high share) will induce individuals to save more than a 50 percent match of up to 5 percent of pay, although both formulations may result in similar costs to the organization providing the match. One possible explanation for that result is that matching acts as a signaling device or implicit advice on saving levels. Also notable is the “stickiness” of saving levels, as evidenced by the fact that most people’s contribution levels remain at the default level even when the defaults are subsequently reduced.

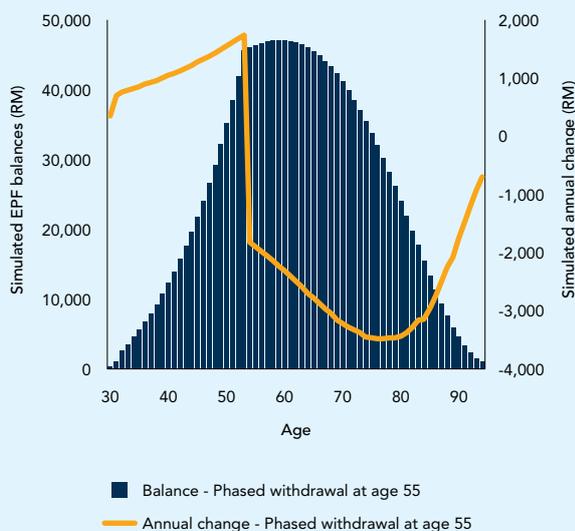
The international evidence strongly suggests that other features of savings programs and related interventions may have a critical effect on participation and contribution levels. *First*, evidence from the United States, the United Kingdom, and New Zealand suggests that making participation the default option has two to four times as much impact as the reverse (of course, an automatic enrollment default option works only under specific employment conditions). The evidence regarding schemes from other countries that make participation the default option on contribution efforts is more mixed and at times negative, possibly because of inertia or the low default contribution rate. *Second*, empirical results for the United States and the United Kingdom and lessons from the German *Riester* pensions suggest that simplified design affects participation and, perhaps, contribution and saving efforts. *Third*, social marketing and advocacy can be key. Retirement saving remains an objective that most will embrace but find difficult to implement. In the United States, information sessions and advocacy have been a useful adjunct to the incentives of matching contributions. In Germany, take-up of the match increased after information campaigns generated greater awareness. New Zealand has coupled the introduction of its system with information and advocacy campaigns which are perceived to have had a positive effect.

Source: World Bank (2019b) based on Hinz et al. (2013).

wages subject to mandatory EPF contributions could be established, similar to the way in which a cap has been established for SOCSO contributions. The level of the cap could be relatively high to ensure that retirement savings are adequate. Similarly, EPF contribution rates could be lowered for individuals who have accumulated sufficient balances for both a minimum benefit in absolute terms and a reasonable replacement rate. As with the recommended increase in the minimum retirement age, all initiatives to increase the contribution histories of EPF members would need to be gradual, well-communicated and inclusive.

- Transition to phased withdrawals of EPF balances and explore annuitization options, longevity insurance and age-based portfolios.** As an intermediate step toward the exploration of annuitization options, phased withdrawals of EPF balances could be mandated to spread income over time. As illustrated in Figure 4.7, phased withdrawal could be based on a calculation that takes the EPF account balance at retirement and divides it by the life expectancy at retirement. Each year, the benefit would be recalculated based on the revised account balance and the life expectancy at the new age. If an individual becomes gravely ill either while working or retired, hardship provisions could permit additional withdrawals. Over the longer-term, age-based portfolios that invest in riskier portfolios for young people while reducing the risk as individuals age could be explored to achieve returns that are improved but remain smooth. Longevity insurance and annuitization options could also be explored as a means of covering risks related to individuals outliving their cash balance and to provide an effective means of sharing longevity risks across retirees. As phased withdrawals offer no insurance against longevity risks, it is also possible for a portion of an individual’s cash balance to be held back until reaching a very high age to ensure that resources are provided for those who live beyond the average life expectancy. It would also be opportune to explore options for the EPF to underwrite the risk of indexed, annuitized benefits while likely drawing upon the expertise of insurance companies to appropriately structure and price such benefit options. Once again, all relevant measures should be introduced gradually as part of a well-considered, well-communicated and coordinated transition process (see Table 4.2).

FIGURE 4.7: Simulated EPF balances by age under phased withdrawal, RM



Source: Authors’ calculations based on EPF

TABLE 4.2: Possible transition phasing

Change	Possible transition phasing
New Account 1 min. withdrawal age	Increase by 6 months every year; thus, the increase from age 55 to 65 will take 20 years.
Convert Account 2 to retirement savings	Five-year transition
Transition to phased withdrawals	Ten-year transition with gradual increase in proportion of balance with mandatory phased withdrawal.
Voluntary annuitization	Once there is a cost-effective system for underwriting risk and covering costs.

Source: Authors.

POLICY DIRECTION 3 **Build an inclusive aged care system** with an enabling market and regulatory environment for private not-for-profit provision, strengthened governance, and selectively increased public financing.

Short-term policy options

- **Develop a systematic and actionable aged care strategy based on a comprehensive assessment and diagnostic.** To move toward developing an inclusive aged care system, the Government could formulate an actionable aged care strategy that outlines policy priorities, sequences, and roadmaps to help implement specific policy measures. The increasing complexity and scale of aged care needs now and in the next few decades, coupled with changing socioeconomic circumstances and living arrangements, are already severely straining the current aged care model. Building on the analysis of this report and the relevant literature, further in-depth analyses including a comprehensive assessment and diagnostic can inform the development of the strategy. Such in-depth analysis would also allow the Government to draw relevant lessons learned from international experiences and best practices to inform the design and implementation of specific policy measures. Finally, the development of an actionable strategy would benefit from the inclusive involvement of many stakeholders in the sector.
- **Improve aged care quality standards to ensure the health and safety of residents of aged care homes and the quality of aged care services.** Although infrastructure and facility standards for aged care homes are already in place, against the backdrop of the COVID-19 pandemic and its impacts on the residents of aged care homes, there is a need to further develop service standards and strengthen the enforcement of these. Steps in enhancing aged care quality standards and enforcement capacity would include (i) developing a national quality standards framework, (ii) strengthening enforcement efforts, (iii) enhancing the Government's capacities to write detailed specifications, protocols, and contracts for aged care services, and (iv) providing training for monitoring, inspection, and implementation of aged care quality standards. In many OECD countries, aged care systems rely heavily on inspection and regulation of long-term care providers to ensure quality. Quality standards usually cover facilities (construction, equipment and services), but less often include home-care services. Instead, for home-care services, it is more common to have standards for qualifications and training of staff. For enforcement, a shift has been witnessed from penalties to incentives for aged care providers with good performance. Malaysia could study and potentially follow the OECD countries' approaches.

Medium-term policy options

- **Streamline and harmonize licensing requirements and processes for existing unlicensed aged care facilities and potential new market entrants.** Private providers of aged care and investors into aged care are important stakeholders. Their entry into the regulated aged care market could be facilitated if licensing and accreditation requirements and processes were streamlined and harmonized across the relevant regulatory agencies. For this purpose, a mechanism such as that used to streamline and harmonize the technical requirements and submission processes for private hospitals could be considered. In parallel, pathways toward regularizing the large number of unlicensed private aged care facilities could be considered, in particular against the backdrop of the COVID-19 pandemic and its health and safety implications for residents of aged care homes. The guiding principle would be that regulatory requirements should foster instead of stifle innovations in aged care service delivery.
- **Strategically reorient public financing toward home and community-based aged care, as well as toward rural and lagging regions.** More than four-fifths of public financing for aged care services

is allocated to RSK and RE which serve less than 2,000 older persons throughout Malaysia. This is even though home and community-based aged care services tend to have much lower unit costs, are generally preferred by almost all older persons and their families, and are typically able to provide adequate care to almost all older persons other than those with the most intensive care needs. Therefore, strategically reorienting public financing toward home and community-based aged care is recommended. In addition, there is also a need to address the imbalance of aged care coverage across states and between rural and urban areas.

Long-term policy options

- **Strengthen arrangements for training and qualifications to upgrade skills of aged care workers.** Malaysia is not the only country that faces a shortage of care workers. To address similar challenges, many OECD countries have strengthened arrangements for relevant active labor market policies (ALMPs). Such arrangements would introduce systematic regulatory arrangements that enable (i) the collection of training needs and setting up job qualification standards, (ii) the opening of training programs and increased access to training and skills development, (iii) enhancement of training capacity through increasing public inputs and strengthening technical and vocational education and training, and (iv) adoption of employment and labor market measures to increase job attractiveness for the aged care sector.³⁹ Beyond training and qualifications of local aged care workers, more demand-driven labor migration policies could also contribute to improving the supply of qualified aged care workers in Malaysia.
- **Selectively increase public financing of aged care services to incentivize a market-oriented and needs assessment-based model of aged care provision and mobilize private and social investment.** Given the limited available fiscal space, public financing for aged care services should be increased and allocated strategically. In terms of beneficiary eligibility, it is international best practice to establish transparent criteria based on a combination of needs assessments and income or asset tests. Based on such criteria, public financing could be targeted equitably and efficiently but with sufficient coverage of the “missing middle,” including the B40. The introduction of more systematic and impactful needs assessments will be important to identify who really has physical and economic needs (see Box 4.3). Needs assessments can also be used to develop customized care plans that meet the diverse needs of older persons. For service provision, the Government could commission more private service providers and more directly monitor their performance to ensure service quality. Tentative steps toward increased financing for commissioned or purchased aged care services could be accelerated given that current direct public provision does not appear to be cost-effective. In addition, a results-based commissioning approach, linked to a strengthened monitoring and evaluation framework, could be studied, piloted and scaled up. Innovative measures that could be supported may include the development of “time banks” and “old folks’ partnership” to promote cooperative assistance between younger and older persons and among older persons.

The promotion of productive and inclusive aging implies a strong role for the government, possibly entailing additional fiscal expenditures and increasing the need to need to address challenges related to increasing revenue. Even gradual increases in fiscal expenditures may be challenging in the context of the downward trend in government revenues and the fiscal shock of the COVID-19 pandemic. Malaysia’s collected revenues have been on a downward trend since 2012, driven by a confluence of factors,

³⁹ There also remains room to expand the coverage of HRDF to relevant subsectors. While HRDF currently covers private hospital services and health support services, it covers neither residential care activities nor social work activities without accommodation.

including the under-collection of personal and consumption taxes, the provision of generous tax incentives, and the failure to develop new sources of revenue. World Bank estimates suggest that in the wake of the COVID-19 pandemic the fiscal deficit could widen to as high as 7 percent of GDP (see World Bank 2020). In the medium and long term, there is therefore a need for the government to diversify its revenue base and to increase its revenue collection through more progressive taxation. Thus, the promotion of productive and inclusive aging will require a mixture of public policy measures on both the expenditure and revenue sides.⁴⁰

In addition to fostering productive employment, providing minimum income protection to older persons, and building an inclusive aged care system, policy efforts in other areas will also be needed to achieve productive and inclusive aging. While this report focuses on the policy areas of employment, income security for older persons, and aged care, a comprehensive analysis of some other relevant policy areas is left for future research. In particular, the report does not specifically discuss Malaysia’s health sector, in spite of the crucial importance of healthy aging. Other relevant policy areas that are left for future research include the fiscal sustainability of the civil service pension system and the interplay between aging and urban planning, as well as housing and mobility. Finally, while the report recognizes that managing aging requires a life cycle perspective, it does not try to comprehensively address all relevant policy areas but focuses on policies either directly affecting older persons or with close linkages or spillovers between older persons and others. Other policy areas that are important from a life cycle perspective, such as children’s nutrition and basic education, are again left for future research.

As documented in this report, with the right mix of policies, the Government of Malaysia can make sure that aging is both productive and inclusive. Recognizing that aging is both a challenge and an opportunity, the right mix of policies can enable Malaysia to adapt to rapid aging, improve the well-being of all, and increase the share of persons that experience old age not as a burden but as a period of their life full of independence, social inclusion and productivity (see Interview quote 4.1).

INTERVIEW QUOTE 4.1

“One thing that I feel satisfied is I am able to do my own stuff now... I even get to attend [college]... I get to absorb various knowledge from there... I also get to see my kids married, and they stay with their own family now. I am happy because I already don’t have any responsibility, they finished their education... During the weekend, we also have family gathering as well. ...I am still active. I go out of the house daily.”

Source: 73-year old male, independent older person

40 To address challenges related to increasing revenue, World Bank (2020) identifies the following measures: *First*, the progressivity of the personal income tax framework could be increased, with a reassessment of current reliefs and exemptions, as a means both to increase revenue and to redistribute income. *Second*, capital gains taxes could be expanded, with explorations to assess the feasibility of other forms of taxes on non-earned income. In Malaysia, inequality in wealth is significantly greater than inequality in income, so taxing a share of the gains made from asset price inflation could provide an important new source of public sector revenue. *Third*, indirect taxation could be broadened by restricting zero rated and exempted items to a more limited set of goods and services. A gradual lifting of the SST exemptions and zero-ratings on selected nonessential items, particularly those not within the B40 consumption basket, could facilitate increased revenue without jeopardizing the purchasing power of lower-income households.

BOX 4.3

Using needs assessments to determine access to and scope of aged care services

An aged care needs assessment is a systematic tool to measure the degree of older persons' limitations and dependencies, and to identify their unmet care needs. One aspect of an aged care needs assessment is the measurement of an older persons' functional ability to live independent of care from others. This measurement often uses specific tools to collect individual information covering various dimensions such as ADLs, IADLs, cognition, communication, pain, and depression. This information is then used to generate scores on the degree of an individual's functional ability. Often,



these scores will be complemented by an assessment of the older person's living conditions, including an examination of his or her household composition, financial conditions and living environment (e.g., dwelling conditions and location). In the next step, the results of the two assessments on functional ability and living conditions can then be combined into one measure or matrix to determine eligibility for publicly financed aged care services. It is noteworthy that in addition to Governments, private aged care service providers often also have their own assessment tools, which are mostly used for pricing and admission for customers.

Aged care needs assessments often involve screenings and professional assessments as two separate steps. Screenings often use a simple set of questions to be posed to older persons to determine if a professional assessment is required. The screening can be done over the phone or face-to-face and collects basic information on a person's needs, circumstances and functional ability. If a professional assessment is required, one or a team of trained assessor(s) will be assigned to the case and tasked with using specific tools to carry out a comprehensive assessment, based on the information collected from the screening. For home and community-based care, the assessment tools are often less complex compared to those for institutional care. The latter encompasses similar client information as the former, but at a deeper level, and the assessor(s) will usually comprehensively assess the older person's physical capabilities, medical conditions, psychosocial factors, cognitive and behavioral factors, physical environmental factors, and restorative needs, if any.

Internationally, various assessment tools to measure an older persons' degree of functional limitations have been developed and used for publicly financed aged care services. For instance, the Resident Assessment Instrument / Minimum Data Set has been used in the United States for the purposes of health status screenings and eligibility determination by nursing homes financed through the public Medicare and Medicaid programs. Some countries have built on the Resident Assessment Instrument / Minimum Data Set to develop their own assessment tools for publicly financed aged care programs. Relevant examples include the Aged Care Funding Instrument in Australia, Easy Care in the United Kingdom, and the Long-Term Care Assessment in Japan.

Results from aged care needs assessments can serve to inform public financing decisions and the development of individual older persons' care plans. The results from aged care needs assessments are helpful for understanding the types of services and the level of care that older persons would need, as well as determining the eligibility and level of public subsidy that they would be entitled to. With this information, the assessor(s), older person, and potentially also the older person's family can work together to establish a care plan that reflects the older person's strengths and abilities, areas of difficulty, and the support that will best meet his or her needs and goals. In addition, aggregate information from aged care needs assessments can also inform the Government budgeting process and the allocation of appropriate but not excessive funding to publicly financed aged care services, with the ultimate objective of meeting older persons' needs in a fiscally sustainable way.

Source: Authors based on OECD (2011) and World Bank (2019c).

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Methodological Annex

A. Definitions

TABLE A.1: Definitions

Term	Definition
Age-management strategies	Human resource strategies that combat age barriers and/or encourage age diversity at the workplace.
Aging society	Occurs when the share of the population age 65 and above is at 7 percent or more.
Aged society	Occurs when the share of the population age 65 and above is at 14 percent or more.
Contributory social insurance	Entitlement to benefits depend on the contributions made by beneficiaries and their employers, for example old-age pension schemes.
Employment income	Income from paid employment and self-employment activities.
Labor force	All persons who are employed or unemployed but not those not actively looking for work or not available for work.
Late-career workers	Workers age 50 years and older.
Minimum retirement age	The minimum age at which an employer can retire its employees. In Malaysia, the minimum retirement age of a private employee is upon the employee attaining the age of 60.
Minimum withdrawal age	The minimum age at which EPF members can withdraw their savings. For Account 1, this is set at age 55, and Account 2 at age 50.
Non-contributory social assistance	Entitlement to benefits require no direct contribution from beneficiaries or their employers, for example cash assistance programs.
Normal retirement age	The age at which a person with an uninterrupted career starting at age 22 can retire without any reduction in their pension.
Old-age dependency ratio	The number of persons age 65 and above divided by the working-age population.
Part-time work	Work of less than 30 hours a week.
Poverty line income	The minimum level of income deemed adequate for a particular country. In Malaysia, this is determined through a cost of basic needs approach.
Super-aged society	Occurs when the share of the population age 65 and above is at 20 percent or more.
Total dependency ratio	The number of persons age zero to 14 and over the age of 65 divided by the working-age population.
Unemployment	Occurs when an individual who is actively seeking and available for employment is unable find employment.
Underemployment	Occurs when an individual works in an employment that does not utilize their full skills, experience and availability to work.
Working-age population	Population between 15 to 64 years old.
Young-age dependency ratio	The number of persons age zero to 14 divided by the working-age population.

Source: Authors.

B. Qualitative Research

This report relied on qualitative research to gather various stakeholders' ideas, concerns, and expectations on aging and aged care in Malaysia. Three interrelated questions were addressed through the qualitative research:

- What are the views on the roles and responsibilities of the individual older person, their families and communities, religious organizations, NGOs, the private sector, and the Government in providing and financing care for older persons?
- What are the views of informal and wage caregivers who provide care to older persons e.g. with regard to their skills, remuneration, working conditions, quality of services, and help wanted from the Government?
- What are the experiences, preferences, ideas, concerns, and expectations of older persons with regard to aged care currently received or expected to be received in the future?

The study focused on four categories of persons, with representatives from each category selected to cover the diversity of Malaysia's society—e.g., urban and rural, male and female, and various ethnicities. The four categories are: (i) independent older persons who are currently retired, mobile and able to take responsibility for their own health and personal issues; (ii) aged care recipients who are individuals unable to care for themselves and have another adult looking after them in order for them to have a safe and healthy environment to live in; (iii) informal caregivers who are unpaid individuals who provide physical, emotional and daily care for older persons (typically immediate or extended family members of the older person); and (iv) waged caregivers who are paid professionals that provide aged care or medical care to older persons.

Qualitative field data collection was contracted to a research firm which organized and conducted 32 interviews involving 42 respondents, with support and supervision provided by the World Bank.

The interview period spanned from May 30, 2020 until July 6, 2020. Due to limitations on physical, face-to-face interactions due to the COVID-19 pandemic, the interviews were conducted via online teleconferencing tools or as audio calls. All interviews were conducted in respondents' native language and typically lasted 45 to 60 minutes. Select interviews were conducted in pairs of respondents, typically comprising one male and one female respondent. Survey instruments in the form of semi-structured interview questions and desired respondent profiles were prepared by the World Bank with feedback from the research firm. The final sample, given constraints due to COVID-19, comprised individuals from the Klang Valley as Malaysia's economic center and Kuala Selangor, a small town in a rural setting, stratified by gender to achieve a 1:1 male/female ratio. The majority of respondents were Malay followed by Chinese individuals. As it was challenging to find Malaysian waged caregivers—likely due to a dominance of foreign workers in this profession, see Section 3.3—the sampling was expanded to include foreign workers (see Table B.1). All interviews were transcribed and, if necessary, translated into English. A qualitative analysis of the transcripts was performed by a consultant proficient in qualitative research methods and documented in a background paper to this report (See French 2020).

Throughout all phases of the field work, quality assurance was provided by the research firm and supported by the World Bank team in the form of close support and supervision. Quality assurance included the administration of an online training covering methods, sampling, and thematic guidelines for the moderators. In addition, detailed advice and feedback regarding the selection of participants, field work, initial interviews, and logistics was also provided by the World Bank team.

TABLE B.1: Characteristics of respondents of qualitative research

Category	Sub-category	Respondents	Locality	Ethnicity / Citizenship
Older persons	Independent older persons	12	10 Urban 2 Rural	8 Malay 4 Chinese
Older persons	Aged care recipients	12	10 Urban 2 Rural	8 Malay 4 Chinese
Caregivers	Informal caregivers	10	8 Urban 2 Rural	6 Malay 4 Chinese
Caregivers	Waged caregivers	8	8 Urban 0 Rural	2 Malay 2 Indian 1 Chinese 3 Noncitizens (Filipino)

Source: Authors.

C. Long-Term Growth Model

This report uses the World Bank's Long-Term Growth Model (LTGM) to analyze the macroeconomic impacts of demographic changes, in particular, how growth in the working age to total population ratio impacts economic growth in Malaysia. The LTGM is an extension of the Solow-Swan growth model where the key building blocks include saving, investment and productivity. The model is developed and maintained by the Macroeconomics and Growth Team of the Development Research Group at the World Bank Group. In addition to saving, investment and productivity, the model also takes into consideration TFP, human capital, demographics, labor force participation and a country's external environment (FDI and external debt).⁴¹ Solving the model requires data on three key parameters: the labor share in production, the depreciation rate of capital and the initial capital to output ratio, and human capital, which are all provided by the Penn World Table. TFP growth is either pulled from the Penn World Table or from other sources. Data on demographic changes and projections (population growth and working-age population ratio) are sourced from the World Bank Human Development Network.

Underlying the simulations in this report is the following base model, reproduced here in an abridged manner from Devadas and Pennings (2019). All simulations are run using an Excel-based toolkit constructed based on this model. The model assumes a Cobb-Douglas specification, where the public and private capital stocks have unitary elasticity of substitution. The following is the production function at time, t :

$$Y_t = A_t S_t (K_t^P)^{1-\beta} (h_t L_t)^\beta \quad (1)$$

Each firm takes technology (TFP), A_t and public services S_t as given, that is, these are externalities to the firm. K_t^P is the private capital stock, $h_t L_t$ is effective labor, which can be further decomposed into h_t , human capital per worker and L_t , the number of workers. $1 - \beta$ and β are private capital and labor income shares.

41 The LTGM with various extensions can be found here: <https://www.worldbank.org/en/research/brief/LTGM>.

The following is the specification for public services S_t :

$$S_t = \left[\frac{G_t}{K_t^{P\zeta}} \right]^\phi \quad (2A)$$

G_t is the efficient physical public capital stock—the public capital that is actually used in production. ζ captures whether public capital is subject to congestion (or not). ϕ is the usefulness of public capital (more technically the elasticity of output to efficient public capital):

$$G_t = \theta_t K_t^{Gm} \quad (2B)$$

Due to corruption, mismanagement or pork-barreling, only a fraction $\theta_t \leq 1$ of measured public capital is useful for production. The measured capital stock K_t^{Gm} is what is recorded in international statistical databases, constructed using the perpetual inventory method. θ_t is the average efficiency/quality of the public capital stock. Equations (1), (2A) and (2B) can be written in a more conventional production function as:

$$Y_t = A_t (\theta_t K_t^{Gm})^\phi (K_t^P)^{1-\beta-\zeta\phi} (h_t L_t)^\beta \quad (3)$$

Equation (3) can be translated into per worker terms by dividing both sides by L_t :

$$y_t \equiv \frac{Y_t}{L_t} = A [\theta_t (L_t)^{1-\zeta} k_t^{Gm}]^\phi (k_t^P)^{1-\beta-\zeta\phi} h_t^\beta \quad (4)$$

where y_t is output per worker and k_t^P is private capital per worker and k_t^{Gm} is measured public capital per worker (note the lower case). $L_t = \varrho_t \omega_t N_t$, where N_t is total population, ω_t is the working age-population ratio and ϱ_t is the labor force participation rate (labor force-to-working-age population ratio).

The above equation can then be used to calculate growth rates of output per worker from t to $t+1$:

$$\frac{y_{t+1}}{y_t} = \left[\frac{\omega_{t+1} \varrho_{t+1} N_{t+1}}{\omega_t \varrho_t N_t} \right]^{(1-\zeta)\phi} \left[\frac{A_{t+1}}{A_t} \right] \left[\frac{\theta_{t+1}}{\theta_t} \right]^\phi \left[\frac{k_{t+1}^{Gm}}{k_t^{Gm}} \right]^\phi \left[\frac{k_{t+1}^P}{k_t^P} \right]^{1-\beta-\zeta\phi} \left[\frac{h_{t+1}}{h_t} \right]^\beta \quad (5)$$

Equation (5) can be rewritten in terms of growth rates from t to $t+1$:

$$1 + g_{y,t+1} = [(1 + \Gamma_{t+1})^{(1-\zeta)\phi}] (1 + g_{A,t+1}) (1 + g_{\theta,t+1})^\phi (1 + g_{k^{Gm},t+1})^\phi (1 + g_{k^P,t+1})^{1-\beta-\zeta\phi} (1 + g_{h,t+1})^\beta \quad (6)$$

where the growth rate of a variable x from t to $t+1$ is denoted by $g_{x,t+1}$, and Γ is the growth rate of the number of workers:

$$1 + \Gamma_{t+1} = (1 + g_{\varrho,t+1}) (1 + g_{\omega,t+1}) (1 + g_{N,t+1}) \quad (7)$$

$1 + \Gamma_{t+1}$ drops out from equation (6) in the congestion default ($\zeta = 1$).

To obtain output per capita, y_t^{PC} from equation (4), $y_t^{PC} \equiv \frac{Y_t}{N_t} = \frac{Y_t}{L_t} \varrho_t \omega_t$. Rewriting this equation in terms of growth rates:

$$1 + g_{y,t+1}^{PC} = (1 + g_{y,t+1}) (1 + g_{\varrho,t+1}) (1 + g_{\omega,t+1}) \quad (8)$$

To obtain output growth, (8) is multiplied with population growth:

$$1 + g_{Y,t+1} = (1 + g_{y,t+1}^{PC}) (1 + g_{N,t+1}) \quad (9)$$

The measured quantity of public capital (as in international statistical databases) accumulates according to a standard capital accumulation identity, with the next period's stock coming from the previous period's undepreciated stock, $(1 - \delta^G)K_t^{Gm}$ (where δ^G is the public capital depreciation rate) and new public investment, I_t^G .

$$K_{t+1}^{Gm} = (1 - \delta^G)K_t^{Gm} + I_t^G \quad (10)$$

The gross growth rate of measured public capital (not per worker) is:

$$K_{t+1}^{Gm}/K_t^{Gm} = (1 - \delta^G) + \frac{I_t^G/Y_t}{K_t^{Gm}/Y_t} \quad (11)$$

The growth rate of measured public capital per worker, which enters equation (6), is:

$$1 + g_{k^{Gm},t+1} \equiv \frac{K_{t+1}^{Gm}/L_{t+1}}{K_t^{Gm}/L_t} = \frac{(1 - \delta^G) + \frac{I_t^G/Y_t}{K_t^{Gm}/Y_t}}{(1 + g_{\theta,t+1})(1 + g_{\omega,t+1})(1 + g_{N,t+1})} \quad (12)$$

The stock of efficiency-adjusted public capital (which is actually used in production) evolves based on the previous period's efficiency-adjusted undepreciated stock and efficiency-adjusted new investment $\theta_t^N I_t^G$.

$$G_{t+1} = (1 - \delta^G)G_t + \theta_t^N I_t^G \quad (13A)$$

θ_t is the average efficiency of existing public capital (rather than the efficiency of new investment).

Substituting $G_t = \theta_t K_t^{Gm}$ into Equation (13A) and rearranging as (13B), one can see the θ_{t+1} evolves as a weighted average of the quality of existing public capital θ_t , and the quality of new investment θ_t^N .

$$\theta_{t+1} = \theta_t \frac{(1 - \delta^G)K_t^{Gm}}{(1 - \delta^G)K_t^{Gm} + I_t^G} + \theta_t^N \frac{I_t^G}{(1 - \delta^G)K_t^{Gm} + I_t^G} \quad (13B)$$

As such, the quality/efficiency of the stock of public capital only changes when the quality of new investment projects is different from that of the existing public capital stock: $\theta_t^N \neq \theta_t$. Using equation (13B), the growth in quality which enters equation (6) can be written as follows:

$$1 + g_{\theta,t+1} \equiv \frac{\theta_{t+1}}{\theta_t} = \left[(1 - \delta^G) + \frac{\theta_t^N I_t^G/Y_t}{\theta_t K_t^{Gm}/Y_t} \right] / (K_{t+1}^{Gm}/K_t^{Gm}) \quad (14)$$

The quantity of private capital follows the same accumulation process as public capital. But with δ^P as the private capital depreciation rate, and I_t^P as private investment. The growth rate of private capital per worker is as follows:

$$1 + g_{k^P,t+1} = \frac{(1 - \delta^P) + \frac{I_t^P/Y_t}{K_t^P/Y_t}}{(1 + g_{\theta,t+1})(1 + g_{\omega,t+1})(1 + g_{N,t+1})} \quad (15)$$

To better understand and simplify the analysis of the drivers of growth, it is helpful to take a log-linear approximation of equation (6). Specifically, equations (12), (14) and (15) are substituted into equation (6). Then, taking logs and using the approximation $\ln(1 + g) \approx g$ (for small g) one can arrive at the following:

$$g_{y,t+1}^{PC} \approx g_{A,t+1} + \beta(g_{\theta,t+1} + g_{\omega,t+1} + g_{h,t+1}) - (1 - \beta)(g_{N,t+1}) + \phi \left[\theta_t^N \frac{I_t^G/Y_t}{\theta_t K_t^{Gm}/Y_t} - \delta^G \right] + (1 - \beta - \zeta\phi) \left(\frac{I_t^P/Y_t}{K_t^P/Y_t} - \delta^P \right) \quad (16)$$

In terms of implementation of the LTGM, the future growth rates of the labor force participation rate ($g_{\theta,t+1}$), the working age to population ratio ($g_{\omega,t+1}$), population ($g_{N,t+1}$) and pure TFP ($g_{A,t+1}$), are exogenously determined. The growth rate of measured public capital per worker ($g_{k^{Gm},t+1}$) is given by equation (12), using the growth rate of the public capital stock from equation (11) as an intermediate step. Private capital per worker growth ($g_{k^P,t+1}$) is given by equation (15). The growth rate of the efficiency of public capital ($g_{\theta,t+1}$) is given by equation (14) using the growth rate of the public capital stock from equation (11) as an intermediate step.

Finally, the model is closed by updating public capital-to-output using equation (17) and the private capital-to-output ratio using equation (18) (with the growth rates in per-worker terms):

$$\frac{K_{t+1}^{Gm}}{Y_{t+1}} = \frac{K_t^G}{Y_t} \frac{(1+g_{k^{Gm},t+1})}{1+g_{y,t+1}} \quad (17)$$

$$\frac{K_{t+1}^P}{Y_{t+1}} = \frac{K_t^P}{Y_t} \quad (18)$$

D. Aged Care Policies, Legislation and Programs

Malaysia has started to formulate its strategic aging framework and aged care policies since the mid-1990s and involved two leading ministries—the Ministry of Women, Family and Community Development (MWFCD) and the Ministry of Health (MOH). In 1995, the National Policy for the Elderly (NPE) was the first strategic policy on aging in Malaysia. To implement this policy, the National Advisory and Consultative Council for Older Persons under the chairmanship of MWFCD was set up in May 1996 and a Plan of Action for the Older Persons was formulated in December 1998. Based on a review of the first strategic policy and the Plan of Action, the National Policy for Older Persons (NPOP, *Dasar Warga Emas Negara*) and Plan of Action for Older Persons (*Pelan Tindakan Warga Emas Negara*) were introduced in 2011 with a broader goal for the old persons related to their development, health and well-being, an enabling and supportive environment, to allow them to have a high sense of self-worth and dignity, which includes short-term, medium-term, and long-term actions up until 2020. Aged care normally includes two aspects of social care and health care. Following the 1995 NPE, the Government developed the National Plan of Action Plan for Health Care of Older Persons in 1997 and issued the National Health Policy for Older Persons 2008 (*Dasar Kesihatan Warga Emas Negara*) to promote healthy, active and productive aging through integrated and comprehensive health and health care services. In addition, the National Plan of Action for Nutrition of Malaysia III (2016-2025) provides nutritional guidance for older persons. Those policies and action plans have articulated relevant Government programs to support the development of the aged care sector.

Aged care legislation in Malaysia has a relatively long history, rooted in its traditional welfare provision model dated back to the late 1970s, and since the early 1990s has kept evolving with a focus on regulating the private sector. The Destitute Persons Act 1977 (Act 183) and related rules in 1980s codified the approaches and procedures of managing and operating public welfare homes for destitute old persons. In 1993, as the numbers of elders increased and demand for private aged care services increased, the Care Centers Act (Act 506) superseded the previous rules and placed the regulation of private aged care

centers (and other care centers), both day care and residential, under the responsibility of the Department of Social Welfare (*Jabatan Kebajikan Masyarakat* or JKM), MWFC. This legislation was shortly followed by the Private Healthcare Facilities and Services Act 1998 (Act 586), which placed the regulation of private nursing homes under the responsibility of MOH. There has been a perception among stakeholders that the regulatory stringency required of care centers under the Care Centers Act was low and that the stringency required for private nursing homes under the Private Healthcare Facilities and Services Act was high for the typical needs of residential aged care centers. To address these concerns, a new piece of legislation—the Private Aged Healthcare Facilities and Services Act (Act 802)—was passed by Parliament in 2018. This most recent act supersedes the Care Centers Act allowing for a 5-year transition period during which care centers licensed under the earlier act will be automatically licensed under the new Act until 2024 and places the responsibility of regulating private aged care facilities, both day care and residential care, under MOH.

Public aged care programs cover institutional care and home and community-based care and they are managed and supervised by JKM. Specifically, a short description of the aged care programs below summarizes the objectives and types of aged care services each program proposes to cover. However, the actual delivery of aged care services and their quality will be further discussed in the later sections. Except the activity centers program, all the programs should meet certain eligibility criteria to access the corresponding services (See Table D.1).⁴²

- **Rumah Seri Kenangan (RSK), Rumah Warga Tua (RWT) in Sabah, and Rumah Sejahtera (RS):** Care homes provide care and protection to the poor independent older persons that allows them to live in peace and enjoy a good quality of life. The catalog of services includes care and protection, guidance and counseling, recreation, medical treatment, occupational therapy, physiotherapy.
- **Rumah Ehsan (RE):** Nursing homes for chronically ill provide care, treatment and protection to the poor dependent older persons that allows them to continue to live in a comfortable and safe environment. The catalog of services includes care and protection, guidance and counseling, physiotherapy, recreation and job recovery, medical treatment.
- **Pusat Aktiviti Warga Emas (PAWE):** Activity centers for older persons offer a place for senior citizens to participate in and perform daily activities in the communities. Activities include religions, recreation, therapy and rehabilitation, health seminar, training or courses, aiming to promote active, productive and healthy aging. It involves strategic cooperation between MWFC, other Government agencies and non-governmental organizations (NGOs).
- **Home Help Services:** Provide social outreach services and support to the low-income older persons and the disabled, especially to those living alone in the absence of family members. This program followed the initiative of NBOS7 - 1Malaysia Family Care, commenced in July 2012, carried out in a strategic partnership between JKM, MOH, and the Welfare Voluntary Organization (PSK). The catalog of services is broad from home visit to providing food and drinks, personal hygiene, house cleaning, to mobile services, physiotherapy, and training family caregivers. Case workers are trained volunteers.
- **Unit Penyayang Warga Emas (UPWE):** “We Care Services” provide transport facilities and services to the older persons who live alone and have physical problems and mental disabilities that limit their movement to get treatment and other services from hospitals or clinics. It was introduced in 2008 by JKM and commissioned to the Central Welfare Council of Malaysia to deliver the services.

⁴² In addition to the public aged care programs listed here, JKM also provides Financial Assistance for artificial aids and assistive devices to assist person with disabilities (PWDs) who are unable to purchase devices such as artificial legs and arms, calipers, crutches, wheelchair, hearing aids, special glasses, special shoes and other aid devices that are recommended by the doctor or specialist. This program aims to improve PWDs capabilities and allow them to be self-reliant.

- **Respite Care:** Provide an alternative service to the caregivers or guardians who could place the older persons temporarily in an institution for a specific period, due to various reasons that require a temporary arrangement. Institutions provide facilities and basic services such as food, health and shelter for the older persons.

MOH has introduced various programs to promote health awareness and provide health care services for older persons. This includes activities such as health promotion and education, health screening and assessment, home visits and home medical services at the community level through PAWE and health clinics—Older Persons Clubs (*Kelab Warga Emas*). At public hospitals, long term care, rehabilitative care, and psychogeriatric care are also provided. Some public hospitals have also opened specialist geriatric units for older persons. MOH has also provided training programs such as six months post-basic course in geriatric nursing for primary care staff in handling health issues for older persons. In addition, home visit, home care nursing, and some basic training for family caregivers were also provided.

As a federation, aged care provision, financing and governance in Malaysia involve the Governments at the federal, state and local levels, and they have different roles in the administrative hierarchy. Both the Federal Government and State Governments have responsibilities to provide for older persons, as social welfare and social services are part of List III (Concurrent List) of Ninth Schedule of the Constitution of Malaysia. The Federal Government has aged care policies and funding for these policies, but State Governments have policies and funding as well. Districts and local authorities are largely responsible for policy coordination and implementation. They are encouraged to provide supplementary financing if local fiscal capacities allow. It is interesting that the Federal and State Governments are also involved in direct provision of aged care services, while Districts and Local Authorities are not.

TABLE D.1. Eligibility criteria for public aged care programs

Programs	Eligibility Criteria
RSK, RWT, and RS	1. Malaysian; 2. Age 60 years and over; 3. No income; 4. No infectious diseases; 5. No relatives / heirs; 6. No permanent residence; 7. Able to take care of themselves
RE	1. Malaysian; 2. Not able to care for themselves; 3. No relatives / heirs; 4. No infectious diseases; 5. No income; 6. Authorized by Government Medical Officer as destitute patients
PAWE	No eligibility criteria; No charge
Home help services	Low-income older persons and the disabled; some eligibility criteria to volunteers
UPWE	The older persons who live alone and have physical or mental limitations
Respite care	Senior Citizens: (i) Bed-Ridden Disabled and Chronically ill; (ii) Age 60 years and above (husband / wife, brother and sister, mother / father, mother / uncle, grandfather / grandmother, grandfather / grandaunt); (iii) Able to manage themselves; and (iv) Malaysian; Heirs/ Guardian: (i) Heir to senior citizens; (ii) Custodian (foster family, friends); and (iii) Malaysian citizen; RM350 per person per month; Placement period: Minimum—one day (1 hour -24 hours); Maximum—30 days or subject to the approval of JKM

Source: Authors based JKM.

Local Governments in Malaysia largely fall under the purview of the State Governments but the Federal Ministries, specifically the Ministry of Housing and Local Government and the Ministry of Federal Territories, have an oversight in expressing, performing, and monitoring all laws related to Local Government (see Table D.2). There are three types of Local Government with a range of responsibilities reflecting their size and capacity: City Councils (in the Federal Territory of Kuala Lumpur and in Sabah and Sarawak), Municipal Councils, and District Councils. The scope of authority is related to urban planning, the development of basic facilities and infrastructure, monitoring development, public health, waste management, business licensing, maintenance of peace and landscape, and improving the local economy. Local Authorities receive revenue from taxes, non-tax revenue, and Federal or State Government allocations.

TABLE D.2. Roles and responsibilities of Federal, State, and Local Government in aged care

Level of government	Governance	Financing	Provision
Federal	Consultation, policy setting and regulation	Predominant source of financing	Direct provision and commissioning
State	Consultation, policy setting and regulation	Supplementary financing	Direct provision and commissioning
District and Local Authorities	Policy coordination and implementation	Supplementary financing	Commissioning of services from NGOs

Source: Authors.

Under National Health Policy for Older Persons 2008, coordination of federal and state policy implementation is the responsibility of both State Action Councils and State Development Committees (chaired by Deputy Secretary of the State Government with the Director of the state-level Social Welfare Department as secretariat) at each state in accordance with the National Policy for Older Persons. Members of the State Development Committees include Government agencies, the private sector, and NGOs. Yearly implementation plans for each state, reflecting the priorities of each state, are to be submitted by the State Committees to the national-level Technical Committee. This state-level structure is approximately mirrored at the District or Local Authority level. Local Authorities further play an important regulatory role in the licensing of private aged care facilities.

E. Additional References

Devadas, Sharmila and Steven M. Pennings. 2019. Assessing the Effect of Public Capital on Growth: An Extension of the World Bank Long-Term Growth Model. *Journal of Infrastructure, Policy and Development* 3: 22–55.



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