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The Hidden Costs of a Successful
Developmental State:
Prosperity and Paucity in Singapore

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ABSTRACT

From the outside, Singapore is widely seen as a successful developmental state. While many argue that its economic transformation is built on hard choices made by the state, few have studied the dark side of these choices. This paper investigates the socioeconomic dilemma it faces today through a mixed-methods approach, analysing trends of growth and inequality; and associated health and social outcomes. It demonstrates that robust growth has come accompanied by high inequality and incommensurately low wellbeing – raising the question of whether its paradigm of growth over equity remains relevant. It posits that whether Singapore's growth and stability can be sustained will depend on the extent and commitment with which it recalibrates its economic and social strategies to meet evolving needs.

LIST OF ACRONYMS

CPF	Central Provident Fund
DOS	Department of Statistics
DPM	Deputy Prime Minister
EDB	Economic Development Board
IMF	International Monetary Fund
ILO	International Labour Organisation
MOH	Ministry of Health
MOM	Ministry of Manpower
MSFD	Ministry of Social and Family Development
NFC	National Family Council
NVPC	National Volunteer and Philanthropy Centre
OECD	Organisation for Economic Cooperation and Development
PAP	People's Action Party
PM	Prime Minister
SSHP	Singapore Social Health Project
WHO	World Health Organisation

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INTRODUCTION

The rationale for this paper is encapsulated in a fictional work by Le Guin (1973), *The Ones Who Walk Away From Omelas*, which describes a utopian city of Omelas where her people live in utmost happiness and prosperity except for one dark secret they share – there is a child kept locked in a basement in utter misery, and the city’s continued success is contingent on the perpetual wretchedness of this child. Free the child and everything that made the city a wonderful place will disappear. Most of Omelas’ people accept this implicit social contract that guarantees their happiness, while others who cannot bear the injustice walk away.

Metaphorically, this work parallels the status quo in Singapore. From the outside, Singapore is widely cited as a successful developmental state that has transformed the country from ‘third world’ to ‘first world’ status within a short span of five decades (Castells, 1992; Lee, 2000; Rowen, 1998). The World Bank (WB) has described it as part of the ‘East Asian Miracle’ (Sazanami, 1995), with many aspiring to it as a model (Chua, 2011). Today, Singapore has the 10th highest Gross Domestic Product (GDP) per capita (US\$52,889) globally (WB, 2017), consistently topping international rankings in terms of being the best place to do business (WB, 2015). Ranked as the best place to live in Asia, it boasts of having the best transport infrastructure (Mercer, 2017) and educational system (Organisation for Economic Cooperation and Development, 2016). Many argue that Singapore’s sustained periods of high growth and structural transformation – alongside other developmental states such as South Korea and Taiwan – are built on hard choices made by its authoritarian government in the domains of economics and politics, and the market allocation of key resources (Fishlow, 1994; Stiglitz, 1996; WB, 2009). Coupled with the provision of world-class public housing, healthcare, and education, the economic transformation facilitated by the hitherto hegemonic state enabled it to secure strong political legitimacy among the people, forging a social compact regarding the balance of Singapore’s economic and social priorities (Chua, 2011; Shatkin, 2014).

However, few have studied the dark side of these choices. In its steadfast pursuit of growth, trade-offs have been made which have come at a cost borne by those who are not immediately visible in the economic and socio-political spheres. Today, inequality in Singapore is significantly higher compared to other developed countries, and has reached severe levels based on international standards such as the UN-Habitat’s International Alert Line for Income Inequality (UN-Habitat, 2008). Theoretical debates abound in the literature pertaining to the

relationship between growth and equity. Within Singapore, spirited debates among academic, public, and policy circles find no consensus to date. On one hand, some purport that inequality is a natural and necessary condition for growth (Banerjee and Duflo, 2003; Kaldor, 1957; Kuznets, 1955), and that redistribution efforts impede growth (Okun, 1975). Others claim that wage disparity is a reflection of differing levels of individual productivity (Mazumdar, 1959), and that inequality is no cause for concern given the low incidence of absolute poverty (Mahbubani, 2001). On the other hand, there is an emerging proposition that more should be done to mitigate inequality given its adverse impact on health and social outcomes (Bhaskaran, 2007; Wilkinson and Pickett, 2010). Although the state has begun to acknowledge and tackle these issues in light of rising discontentment within society, it has remained firm on its quest for economic growth, reiterating the rhetoric asserted by its first Prime Minister (PM) Lee Kuan Yew in 1974 that “growth must come before sharing” (Pang, 1975, p.15).

Going beyond the veil of Singapore’s economic prosperity, this paper analyses whether the longstanding paradigm of growth over equity can continue to hold in light of the rising social costs in recent years. This paper is structured as follows: Part I presents the historical context of Singapore’s economic and socio-political landscape and its current socioeconomic dilemma. Part II reviews key theoretical concepts and debates on the relationship between growth and equity, and outlines the methodological approach employed. Part III analyses historical trends of growth and inequality; and associated levels of societal wellbeing. Part IV reviews the state’s evolving rhetoric, efforts, and social compact in relation to the findings, and discusses potential policy implications.

The socioeconomic dilemma presented in this paper essentially raises the question of whether – given the levels of economic growth, inequality, and social costs in Singapore today – the time has come for *sharing* to claim equal, if not greater, priority as that of *growth*. Ultimately, this paper argues that while Singapore’s emphasis on growth has enabled it to attain stellar economic progress to date, emerging costs in terms of high inequality and detrimental health and social problems have begun to render the continued adequacy of this paradigm contentious.

PART I: HISTORICAL CONTEXT

2.1. State-led Development in Singapore

Today, Singapore's economic achievements stand in stark contrast to the plight faced by the country five decades ago. At the time of its independence in 1965, Singapore was a small tropical island of 580 square kilometres and 1.9 million people, completely devoid of natural resources (Abeysinghe, 2015). Half of its population were illiterate; unemployment levels stood at 8.7 percent, with many trapped in low-paying, labour-intensive jobs (International Monetary Fund, 2017; Yuen, 2004). GDP per capita was a paltry US\$921 (IMF, 2017), and the economy was primarily dependent on low-end commerce and industries catered to domestic consumption (Economic Development Board, 2016a; WB, 2009). Nearly three quarters of its population lived in unsanitary, overcrowded conditions, with many squatting along the city's periphery (WB, 2009). Racial tensions were high among its diverse ethnic groups, erupting in a series of violent racial riots (Abeysinghe, 2015). It was in this context of economic and socio-political uncertainty that the state had to act, and to act quickly.

The dire circumstances arising from Singapore's unwelcome separation from Malaysia at that time birthed a strong rhetoric of survival anxiety within the government and people (Chua, 2011; Yeo, 2001). This called for minimal political dissent to enable smooth policymaking and implementation; racial harmony among various ethnic groups to ensure social stability; and economic growth to be promoted as the country's top priority (ibid). Pursuing an export-oriented industrialisation approach, the state focused on creating an open, business-friendly environment with agreeable tax laws to attract foreign capital investments; and developing key manufacturing industries in the initial stages (Sen, 1981; White and Wade, 1984; Rodan, 1985). These efforts paid off as foreign multinational companies (MNCs) began to commit substantially to manufacturing projects in Singapore (EDB, 2016b). It then sought to diversify the economy by concurrently attracting global service corporations spanning sectors such as finance, biomedicine, and education (EDB, 2016c). Its commitment to continuously upgrade the economy through high value-added industries served to facilitate its rapid growth (EDB, 2016d).

To augment its industrialisation strategy, strong emphasis was placed on education with the aim of building a productive labour force equipped with the requisite skills to meet evolving industry demands (Deng and Gopinathan, 2016; Gopinathan and Mardiana, 2013; Sanderson, 2002). On the housing front, the state undertook an ambitious programme of slum clearance, housing reconstruction, and urban renewal which proved remarkably successful (WB, 2009). Five decades on, the slums of the sixties have vanished. Over 80 percent of the population reside in quality public housing, with 90 percent being home-owners (Housing and Development Board, 2014). Mandatory racial quotas were set for public housing estates to ensure ethnic representation, with community centres to promote racial integration and harmony (Phang and Kim, 2011).

It is noteworthy that Singapore has seen unbroken political continuity throughout its development trajectory. Its current ruling party, the People's Action Party (PAP), has held office since 1959 when Singapore first obtained independence from Britain (Huff, 1995). While the early years saw PAP – established by Singapore's first PM Lee – relentlessly suppressing political demur to eliminate effective opposition (Chua, 2011), PAP's dominance in the subsequent decades was arguably built on the political legitimacy it has secured among the people through its critical role in enabling Singapore's economic transformation (ibid; Lee and Morris, 2016). Rather than falling prey to corruption, PAP leveraged on the stability afforded by the unchanging political regime to design and implement long-term policies (Chua, 2011). The absence of political opposition and continued public mandate enabled it to build a world-class civil service, with Singapore being ranked as the fifth least corrupt globally (Transparency International, 2017).

2.2. Hidden Costs of Singapore's Economic Success

While Singapore's strong growth has resulted in overall increases in incomes and living standards, issues related to inequality have begun to emerge and persist in recent years, creating a new socioeconomic dilemma for the city-state. Despite its rising prosperity, Singaporeans were found to have a significantly lower level of 'happiness' as compared to similarly prosperous countries in the Nordic region (Helliwell, Layard and Sachs, 2017). The extent of this discontentment was most clearly manifested in the results of the 2011 General Elections in Singapore, where the opposition attained unprecedented gains in a political landscape that had historically been marked by PAP's hegemony (Tan and Lee, 2011). The intense public

debates leading up to and in the aftermath of the elections surfaced the people's underlying anxieties concerning financial insecurity and livelihood uncertainties, in view of the influx of foreigners and inadequate state support (Low and Vadaketh, 2014). The levels of trust in the government have continued to decline according to the 2017 Edelman Trust Barometer Index¹ (Goh, 2017). Based on the survey, the pace of growth in business and industry was perceived by 70 percent of Singaporean respondents to be too fast, compared to the global average of 53 percent who reflected this sentiment (ibid).

Tracing the roots of income inequality to Singapore's economic development, studies point to the state's pursuit of growth as the key driver accounting for the growing wage disparity (Tat and Toh, 2014; Smith et al; 2015). Its export-oriented industrialisation strategy entailed significant imports of not only foreign technologies but also foreign labour, with emerging sectors requiring sizable manpower with specific skills that were not immediately available in the workforce. This therefore led to an influx of foreign workers on both ends of the income spectrum: those on the higher end working in foreign MNCs; and those on the lower end performing labour-intensive jobs at below-average wages – resulting in a fall in aggregate wage share for local workers (ibid). With Singapore ranked as the most expensive city for the fourth consecutive year (Economist Intelligence Unit, 2017), the rising living costs, stagnating wages, and loss of jobs to foreigners collectively present Singaporeans with tangible concerns regarding their social and economic welfare (Low and Vadaketh, 2014). Coupled with its rapidly ageing population which will intensify pressures on the working population, the impetus to address this socioeconomic dilemma becomes even more pertinent.

¹ This is an annual survey measuring the degree of trust across countries.

PART II: THEORETICAL FRAMEWORK

3.1. Concepts of Inequality

In order to establish the theoretical groundwork for this paper's analysis, it is useful to first examine the key notions of inequality in the literature, and specify that which is relevant to this paper. Broadly, the literature has differentiated between various classifications of inequality. Non-monetary dimensions include that in terms of opportunities and outcomes (WB, 2005); desirable and undesirable (Chaudhuri and Ravillion, 2006); and market and structural (Easterly, 2007). Monetary forms of inequality are most commonly expounded on. Income inequality refers to the income gap between different strata of society, while capital inequality is defined as the gap in terms of the amount of capital and the corresponding income gained from this capital between segments of the population.

In particular, income inequality has been most widely discussed, largely due to greater data availability given its relative ease of data measurement and collection. Nonetheless, the notion of capital inequality has recently gained prominence with the publication of Piketty's (2014) work, *Capital in the Twenty-First Century*. In his work, Piketty posits that capital inequality in societies increases when the rate of return on capital exceeds that of economic growth, and that this century will see extreme levels of inequality which would fuel social unrest and undermine democratic order (ibid). While these issues of capital inequality are relevant to Singapore, requisite data such as estimates on the rate of return to capital are unavailable for analysis. This paper thus focuses specifically on income inequality, the data on which is most readily available to provide for a meaningful investigation.

3.2. Key Theoretical Debates on Growth and Equity

Debates on the relationship between economic growth and equity abound in the literature, but there remains little consensus on their interconnection. To provide an overarching conceptual frame, this subsection reviews the key theoretical debates pertaining to growth, inequality, and redistribution at the global level which are of particular relevance to advancing the analysis of this paper.

The conventional view on the relationship between growth and equity is rooted in Kuznets' (1955) classic thesis. Following an inverted "U" curve, he argues that in the process of countries' economic growth, income inequality is expected to increase in the initial stages of growth before decreasing subsequently as wealth and opportunities spread across the population. This suggests that inequality is a natural phenomenon that would be self-correcting in the later stages of growth, based on the premise that the wealth generated through the country's growth would eventually be distributed across all strata of society. This view is bolstered by Meltzer and Richard's (1981) work, in which they argue that greater inequality would generate pressures for redistribution. In a similar vein, ideas rooted in supply-side economic theory have given rise to the view that growth can improve the socioeconomic welfare of the poor even in the face of inequality (WB, 1985). This is argued on the basis that the wealthy can help to create jobs and investments, thereby boosting economic growth which can generate further benefits and resources in favour of the poor. In this view, growth holds 'trickle-down' effects that would ultimately benefit the poor, although these benefits are disproportionately smaller to that enjoyed by the rich (ibid).

Some theorists go further to assert that inequality is not only natural but necessary for growth. This perspective stems from the perceived merit of inequality in encouraging healthy competition to drive innovation (Lazear and Rosen, 1981); increase investments (Kaldor, 1957); spur economic growth (Banerjee and Duflo, 2003); and promote asset accumulation for education and entrepreneurship (Barro, 2000). In response to the notion of redistribution as a means to reduce inequality, some argue that redistribution would invariably lower economic efficiency and dynamism, consequently impeding growth (Okun, 1975; Friedman, 1999; Jaimovich and Rebelo, 2012). They contend that such policies which typically entail the adoption of more progressive taxation and increases in social spending would not only decrease the incentive of the individual to strive hard, but also raise costs for businesses, therefore curbing investments and growth (ibid). As such, an inevitable trade-off is said to exist between growth and equity (Okun, 1975).

However, this strand of theories which argue that inequality is a natural or even necessary condition of growth has increasingly been called into question. For instance, Kuznets' thesis has been refuted by many scholars who demonstrate that his inverted "U" curve does not hold based on empirical data of modern economies (Deininger and Squire, 1996; Dollar and Kraay, 2000; Ravallion, 2001), including that of Singapore (Mukhopadhyaya, 1999). Extensive cross-

country research conducted by Ravillion (2005) also shows that there is a lack of evidence to prove that growth is naturally accompanied by a redistributive effect that favours the poor. This indicates that wealth has not trickled down to the poor in later stages of growth as purported in conventional theories, and that inequality has not shown to be naturally self-correcting. This has raised concerns and spurred others to further investigate the effects of inequality on growth. Recent research by IMF finds that there is no significant trade-off between growth and equity, and that lower inequality is instead correlated with faster and more sustained growth (Ostry, Berg and Tsangarides, 2014). Others have also pointed to Scandinavian countries which have managed to sustain strong growth and equity as examples to show that the trade-off between growth and equity is far from being validated (Low, 2014).

A resurgence of research on the topic has found inequality to be inimical to growth and stability. Recent empirical studies show that there is a negative relationship between inequality and growth (Easterly, 2007; Berg and Ostry, 2013; Dabla-Norris et al, 2015). OECD's latest analysis demonstrates that an increase in inequality is associated with a fall in a country's medium-term growth (Cingano, 2014). It estimates that rising inequality has curbed over four percentage points of growth in half of the 21 OECD countries studied in the past two decades (ibid). A myriad of mechanisms through which inequality adversely affects growth and stability has been proposed. From a political economy perspective, this includes explanations such as high inequality resulting in the rich hampering redistributive policies that are growth-enhancing (Alesina and Rodrik, 1994). Inequality is also said to deprive the poor from keeping healthy and accumulating human capital (Perotti, 1996; Galor and Moav, 2004). Some cite inequality as a driver of both economic and political instability which dampens growth (Rajan and Lines, 2010; Stiglitz, 2012), while others argue that it hinders the social consensus necessary for an economy to adapt to shocks and maintain resilience and growth (Rodrik, 1999).

From a social dimension, an emerging proposition rooted in Wilkinson and Pickett's (2010) seminal work, *The Spirit Level: Why Equality is Better for Everyone*, asserts that high levels of inequality hold detrimental effects on societal wellbeing. Drawing on epidemiology and social science, Wilkinson and Pickett (2010) find that unequal societies historically face worse health and social outcomes, such as increased levels of violence, social distrust and unrest, mental health issues and drug use. This negatively impacts not only the poor but all strata of society, contributing to poorer performance (ibid). Contrary to conventional theories, these

findings suggest that inequality – rather than equity-promoting redistribution – is the key factor impeding growth.

While the literature remains divided on the relationship between economic growth and equity, with empirical evidence not serving to resolve the lasting debate, the findings uncovered by recent studies appear to point to a tentative consensus on the harmful effects of inequality on growth and social stability. Coupled with the widespread phenomenon of rising inequality and mounting discontentment within developed economies, this suggests that the conventional paradigm of growth over equity may not hold moving forward. In this context, Wilkinson and Pickett's (2010) theory on the negative impact of high inequality on health and social outcomes provides a constructive theoretical grounding on which this paper's analysis is conducted.

3.3. Framing the Debate in Singapore's Context

The classical arguments that inequality is required for growth and that growth is essential to help the poor have underpinned much of Singapore's development approach. Indeed, its state-led development model has worked well in the decades following its independence. Robust growth has helped to raise living standards and provide the state with the resources required to deliver world-class public infrastructure and services without overtaxing national reserves (Bhaskaran et al, 2012). This has led the World Bank (1993) to laud Singapore on its ability to have achieved "growth with equity" in its initial stages of development. This also formed the basis of its social compact – one founded on the notions of economic growth and job creation as key priorities; individual responsibility and self-reliance over state welfare; and a prudent social security system that underlines savings and home ownership (Bhaskaran et al, 2012).

Yet, this social compact has not seen Singapore's initial achievement of *growth with equity* continuing into subsequent decades. The conventional view that inequality would correct itself and that benefits from growth would trickle down to the poor has not appeared to be the case for the city-state (Low and Vadaketh, 2014). Its rapid growth has come accompanied by challenges associated with inequality, the costs of which seem to be borne by marginalised groups in light of inadequate state support. Such a predicament has generated three main types of responses in the local literature and among policy circles. The first two reinforce the notions behind Singapore's existing social compact, while the third calls for it to be reassessed.

One orthodox argument is that inequality in Singapore is a reflection of varying levels of individual contributions (Smith et al, 2015). This neoclassical perspective is rooted in marginal productivity theory, which argues that each individual earns a remuneration equal to his or her marginal productivity due to competition (Mazumdar, 1959). Singapore's strong meritocratic system – rooted in the belief that individual merit determines an individual's outcomes – has been drawn upon to augment this line of argument. Higher remuneration is said to be warranted for those who are more capable and diligent, a perspective which sits in tandem with the government's stance (Low, 2014). In line with mainstream arguments, some also state that inequality is needed to maintain economic competitiveness (ibid). A second stream of reasoning asserts that inequality is not a cause of concern given that absolute poverty no longer exists in Singapore and that income levels have seen an overall increase (Mahbubani, 2001). In advancing this argument, the living standards of Singapore's poor are often compared to that of those in developing countries in the region (Lee, 2012).

As a counterargument to the aforementioned lines of reasoning, the third emerging proposition argues that inequality is a structural problem which holds severe effects on societal wellbeing. Rather than individual productivity dictating wages, incomes are found to be increasingly determined by factors such as globalisation, technological change, and state policies, especially those pertaining to immigration regulations (Bhaskaran et al, 2012; Low and Vadaketh, 2014; Smith et al, 2015). Further, research suggests that meritocracy, rather than forming the basis for equity, has instead worsened inequality (Dhamani, 2008; Low, 2013; Tan, 2008). This is particularly so in Singapore's meritocratic system, where certain groups of individuals are found to be systematically restricted from accessing particular sets of privileges and social advantages in their attempts to achieve desired outcomes (Moore, 2000).

Consistent with the emerging body of international research which argues that inequality holds harmful effects on societal wellbeing (Frank, 2007; Wilkinson and Pickett, 2010), there have been nascent efforts to study the associated health and social outcomes in Singapore. In particular, the National Volunteer and Philanthropy Centre (NVPC) initiated the Singapore Social Health Project (SSHP) in 2013 (NVPC, 2013). Aimed at developing social indicators to assess societal wellbeing beyond that of economic measures, this unprecedented study evaluated Singapore's social health in nine key domains of healthcare; education; individual wellbeing; family; income security; social connectedness and community cohesion; housing

and transport; civil and political participation; and culture and values². It found that Singapore fared negatively in five out of the nine identified dimensions, namely, healthcare; family; individual wellbeing; income security; and housing and transport (ibid).

In terms of healthcare, SSHP's findings indicate that a rapidly ageing population and growing incidence of chronic illnesses have contributed to a rise in healthcare needs of Singaporeans. However, this is juxtaposed against increasing healthcare costs, limited availability of care services and facilities, and low public healthcare expenditures. In the dimension of familial relations, family values of trust and support were found to have weakened in light of declines in marriage and birth rates, and rising cases of family violence and divorce. On individual wellbeing, the results suggest that there has been growing anxiety arising from stagnating incomes and rising living expenses. Suicide rates, emotional distress, and youth drug abuse cases have increased in recent years – in tandem with Wilkinson and Pickett's (2010) findings. Coupled with long working hours despite aspirations for work-life balance, this has led to low levels of overall wellbeing.

Given that Singapore is a small, open, and ethnically diverse society requiring a high degree of social cohesion and stability for it to function effectively, scholars warn that these issues pose as significant threats to the city-state's continued growth and stability (Smith et al, 2015). They argue that the state's rhetoric of growth over equity needs to be reassessed, and that there should be a greater focus on addressing inequality and its associated effects (Bhaskaran, 2007; Low and Vadaketh, 2014; Mukhopadhaya, 2014).

3.4. Research Methodology

In order to address the research question of whether Singapore's enduring paradigm of growth over equity can continue to hold moving forward in light of rising inequality and social costs, this paper employs a two-pronged approach to investigate the dual aspects of this socioeconomic dilemma. Grounded in both theory and empirical evidence, this methodology takes the form of a mixed-methods approach.

² See Appendix A1

The first part analyses historical trends of growth and inequality to assess how the empirical data fares within the frame of the key theoretical debates on growth and equity presented in the literature review. This is achieved through quantitative analysis, utilising time-series data including the latest 2016 statistics published by the Department of Statistics (DOS) derived from national household surveys. Computations have been done to develop indices of average incomes by population deciles to depict the extent to which the income gap has grown among various strata of society. The trends of the following are studied: GDP growth, wage share, and the Gini coefficient³; average income by population deciles; and the ratio of average income at the 90th percentile of the population to that of the 10th percentile.

The justifications for selecting these variables for analysis are twofold. First, they have been identified as key representative indicators of income inequality in Singapore (Tat and Toh, 2014). Second, given that these variables have been widely analysed in various studies (ibid; Chen, 1974; Tan, 2012), using them in this paper's analysis maintains data consistency which serves to facilitate future studies and cross-comparisons. Although the trends of growth and inequality have previously been studied through varying lenses (ibid), they are based on older datasets and the literature has not seen analyses conducted using the latest datasets from 2014. As such, the first part of this analysis provides an updated assessment of these trends in relation to the key theoretical debates on growth and equity as outlined, based on latest available data.

The second part draws on Wilkinson and Pickett's (2010) central thesis – that high inequality has negative effects on societal wellbeing – as the overarching theoretical frame with which to assess the health and social outcomes associated with Singapore's growth and inequality. Based on this conceptual frame, it builds on SSHP's research design and findings to study the levels of societal wellbeing through both quantitative and qualitative analysis, focusing specifically on the dimensions of healthcare, familial relationships, and individual wellbeing. There are several reasons for selecting these dimensions for analysis. First, they represent three of the key priority areas identified by SSHP as requiring urgent attention (NVPC, 2013). Second, their significance within the Singapore context has been reinforced by other studies done on Singapore's societal wellbeing (DeGolyer and Lai, 2016; Tambyah and Tan, 2012). Third and more broadly, they are aligned with the variables studied in Wilkinson and Pickett's (2010) work, which provides the theoretical frame for this analysis. In terms of the data used

³ The Gini coefficient represents the ratio of the highest to lowest incomes in a given society (Gini, 1921).

for analysis, quantitative data include statistics published by both local and international sources including DOS, Ministry of Health (MOH), and World Health Organisation (WHO), while qualitative data comprise research and policy papers, national surveys, and news reports, in attempt to provide a holistic account of wellbeing.

The rationale for adopting and building on SSHP's methodological approach is as follows. First, there is a lack of social indicators that measure levels of societal wellbeing in Singapore, as pointed out by various scholars who have advocated for the establishment of such measures (DeGolyer and Lai, 2016; Diener and Tov, 2012; Ng, 2015). In this view, SSHP represents an unprecedented study aimed at addressing this knowledge gap, through developing a preliminary set of social indicators appropriate to the Singaporean context. Second, SSHP's methodology is theoretically robust and evidence-based, which provides a useful basis for this paper's analysis. This is premised on the fact that it has systematically drawn on international literature and scanned the global landscape on social health measures to develop an initial list of relevant indicators, before condensing them under the nine identified domains. This was done by taking into account factors such as whether the indicators are: nationally significant, reflecting progress at the national level; relevant to the social outcome of interest, in terms of their representativeness and accuracy; and timely and available, in terms of the data required.

This two-pronged approach therefore serves to build on each layer of analysis, providing the necessary depth and context in order to investigate the relationship between economic growth and inequality; and how they intersect with societal wellbeing in terms of social and health outcomes in the dimensions of healthcare, familial relationships, and individual wellbeing. Collectively, this enables an analysis of the dual aspects of this socioeconomic dilemma, thereby unlocking the pieces necessary to address the research question of this paper.

3.5. Challenges and Data Limitations

While this paper's methodology is designed to provide as accurate and representative an analysis as possible, it is critical to note the limitations in evaluating the levels of societal wellbeing associated with growth and inequality. Although the approach based on SSHP's research design is theoretically sound and evidence-based, the lack of regular time-series data in the domains of healthcare, familial relations, and individual wellbeing renders a proportion

of the key information – such as the proportion of expenditure on healthcare by population deciles – unavailable for analysis.

Further, various scholars have highlighted the inherent challenges in establishing any form of causality between growth and inequality alongside its associated social and health outcomes, and instead emphasised the value in studying specific aspects of inequality such as healthcare (Krugman, 2015; Stiglitz, 2012). In this vein, it is important to clarify that this paper's aim is not to identify a causal relationship among these variables, but rather, to provide a nuanced perspective by studying the correlation between them. In this light, this paper serves as a best attempt to analyse the interlinkages between economic growth and income inequality alongside associated levels of societal wellbeing in Singapore based on the aforementioned data.

PART III: FINDINGS AND ANALYSIS

4.1. Historical Trends of Growth and Inequality

This subsection analyses the trends of growth and inequality in Singapore to assess how the empirical data fares relative to the key theoretical debates on growth and equity. First, by comparing wage share of GDP against that of real GDP growth in the past 20 years, Figure 1 shows that while there has been an overall increase in wage share from 40 percent in 1997 to 45 percent in 2016, Singapore’s wage share has remained relatively low compared to the average of 62 percent in other advanced economies (International Labour Organisation and OECD, 2015). Further, it is evident that periods of strong growth have been associated with declining wage share. For instance, in the periods of 1998 to 2000, 2001 to 2004, and 2009 to 2010 where Singapore experienced rapid GDP growth (as marked out in Figure 1), this corresponded with stark declines in wage share of 3.9 percent, 11.1 percent, and 5.4 percent respectively. Correspondingly, as growth slowed from 2010 to 2016, wage share saw a steady incline. As such, the data suggests that despite the overall increase in wage share in the past two decades, wage share has declined significantly in periods of robust economic growth.

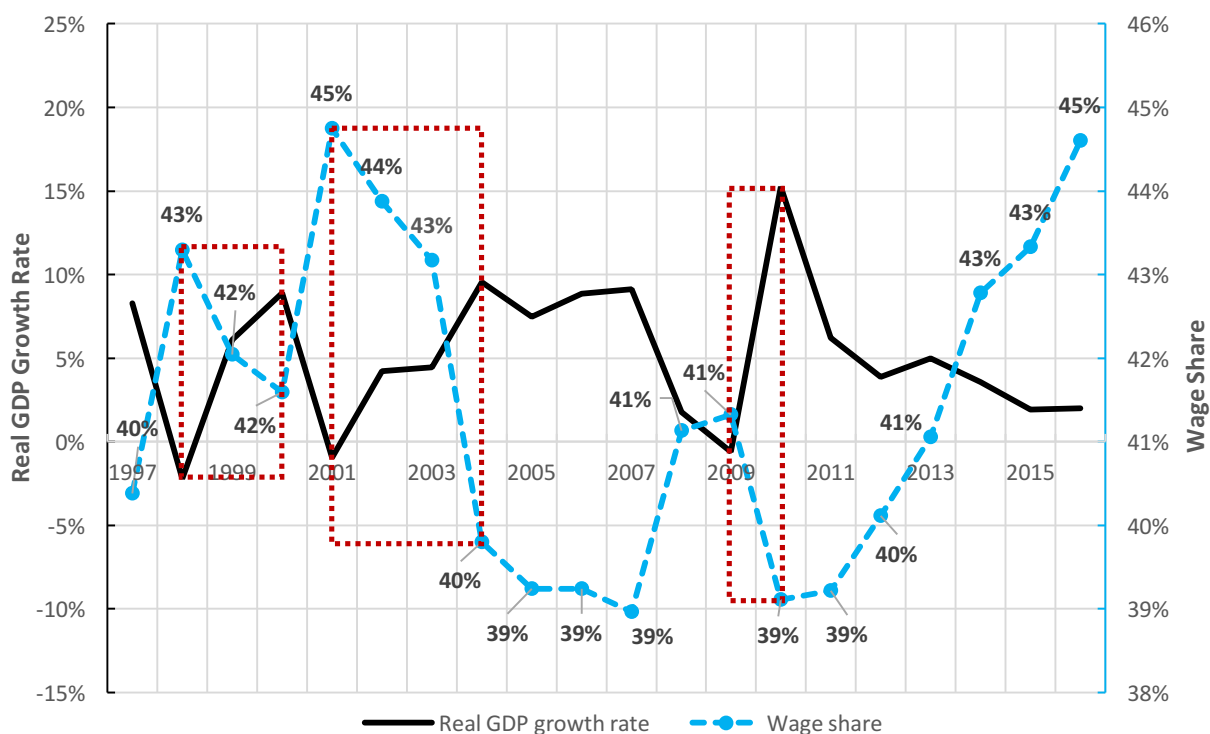


Figure 1: Real GDP Growth and Wage Share⁴

⁴ Generated by author using DOS (2017) data (See Appendix A2)

This finding reinforces an earlier observation made by Tat and Toh (2014) in a research paper commissioned by ILO on growth and equity in Singapore. Based on time-series data from 1992 to 2012, the study identified a similar correlation between increasing growth and falling wage share and attributed this to the influx of foreign labour during the period. This was based on the premise that majority of the foreign labourers employed then were engaged in low-skilled work and earning below-median wages, thereby contributing to the decline in wage share. Reflecting Singapore’s industrial development strategies, the findings indicate that this trend has continued into recent years.

Next, comparing the Gini coefficient with GDP growth over the same period, Figure 2 shows that there has been a marked increase in inequality from 0.412 in 1997 to 0.458 in 2016 at an average rate of 12 percent, notwithstanding fluctuations in GDP growth. Singapore’s Gini coefficient saw a steady, rapid incline from 1997, reaching a peak of 0.482 in 2007. Based on international guidelines, Singapore’s inequality has remained significantly high in the last two decades. Its Gini coefficient range of 0.410 to 0.482 lies well above UN-Habitat’s International Alert Line for Income Inequality of 0.4 (UN-Habitat, 2008).

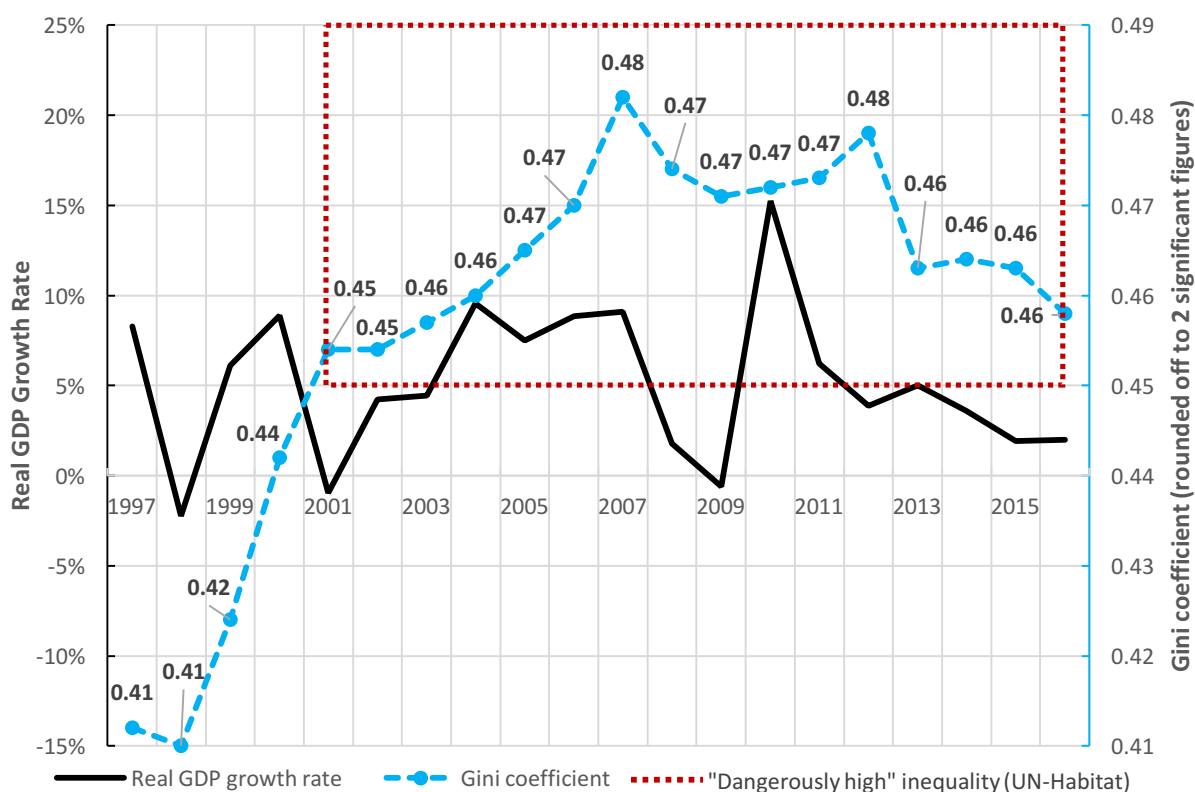


Figure 2: Real GDP Growth and Gini Coefficient⁵

⁵ Ibid (See Appendix A2)

Although the Gini coefficient has seen a relative decline in recent years from 0.478 in 2012 to 0.458 in 2016 as illustrated in Figure 2, it has remained in the “dangerously high” range of 0.45 to 0.49 since 2001 according to UN-Habitat standards, which warns countries of potential losses in investment and social unrest should remedial actions not be undertaken (ibid). In view of the pronounced increase in inequality as reflected by the Gini coefficient from 1997 to 2016, the data suggests that overall increases in wage share have not been evenly distributed across all strata of society.

To obtain a more nuanced understanding of rising income inequality, the average monthly income of employed residents is plotted for each decile of the population over the period from 2000 to 2016. As illustrated in Figure 3, average incomes of the lowest decile have stagnated significantly in contrast to the rapid incline in wage growth of the 91st to 100th decile. For instance, average wages of the top decile saw a growth rate of 120 percent from 2000 to 2016, almost double that of the lowest decile of 70 percent. In comparison, average wages of the second richest decile (81st to 90th) saw a growth rate of 110 percent. As displayed in Figure 3, it is evident that the income gap between the top decile and the rest of the population has widened markedly over the same period.

To further examine the extent of wage disparity among the various population deciles, indices of average monthly incomes for each population decile are computed and mapped out as depicted in Figure 4. The results show a striking divergence in average incomes especially between the richest decile of the population (91st to 100th) and the poorest decile (1st to 10th). Wages of the second poorest decile (11th to 20th) also appear to be lagging behind a squeezed middle-class, while the top decile has pulled significantly ahead.

Specifically analysing the income disparity between the richest and poorest deciles of the labour force, Figure 5 shows that there has been a general upward trend in the ratio of average monthly incomes at the 90th percentile to the 10th percentile. This has increased significantly from 7.7 in 2000 to 8.7 in 2016 at an average rate of 13 percent, reaching a peak of 9.6 in 2008. In line with the historical trend of the Gini coefficient, there has been a slight decline in the ratio from 2010 to 2016. Nonetheless, the wage disparity between those in the top and bottom segments of the labour force has been identified to be the largest among developed countries (Wilkinson and Pickett, 2010).

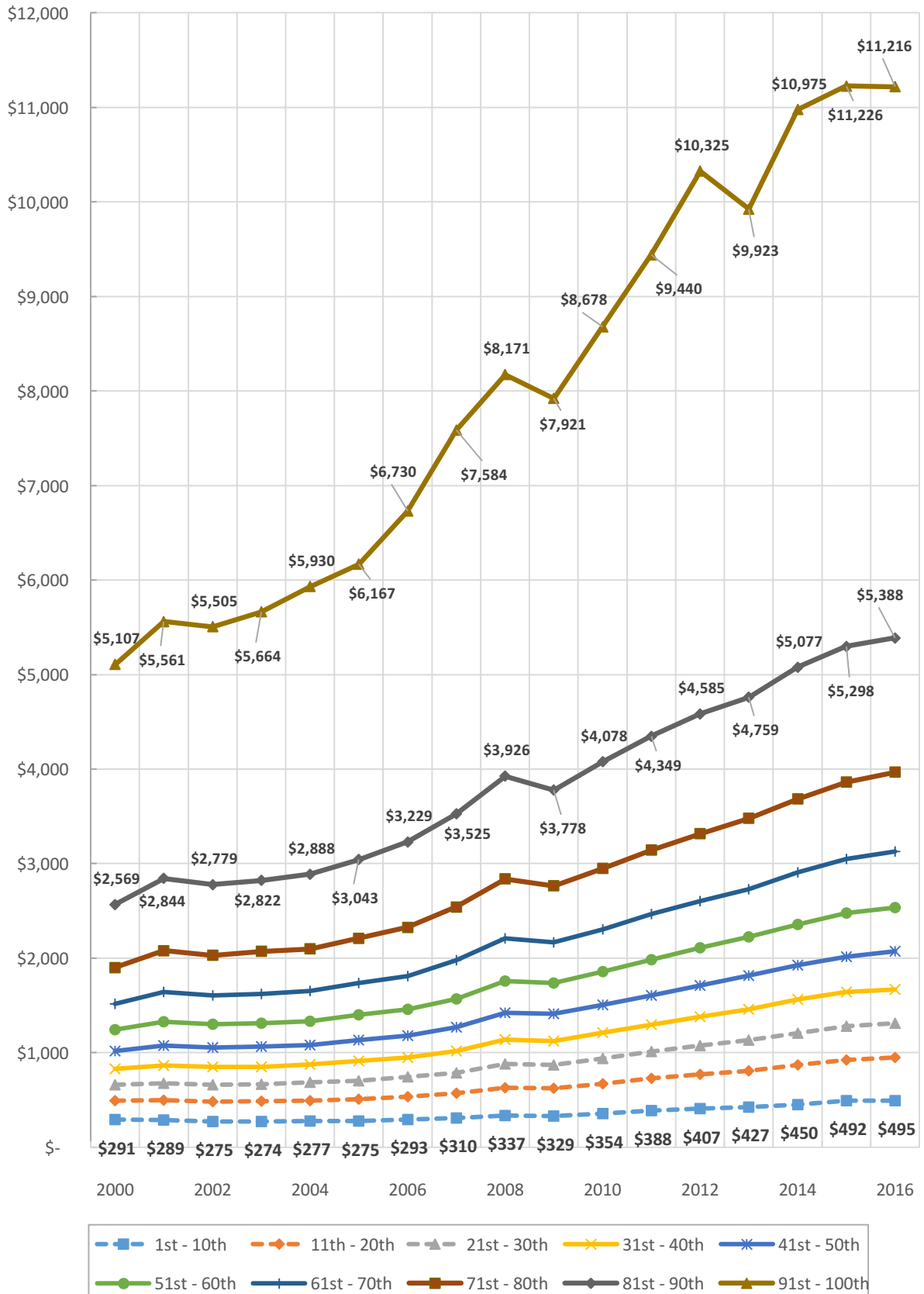


Figure 3: Average Monthly Income of Employed Residents by Deciles⁶

⁶ Ibid (See Appendix A3)

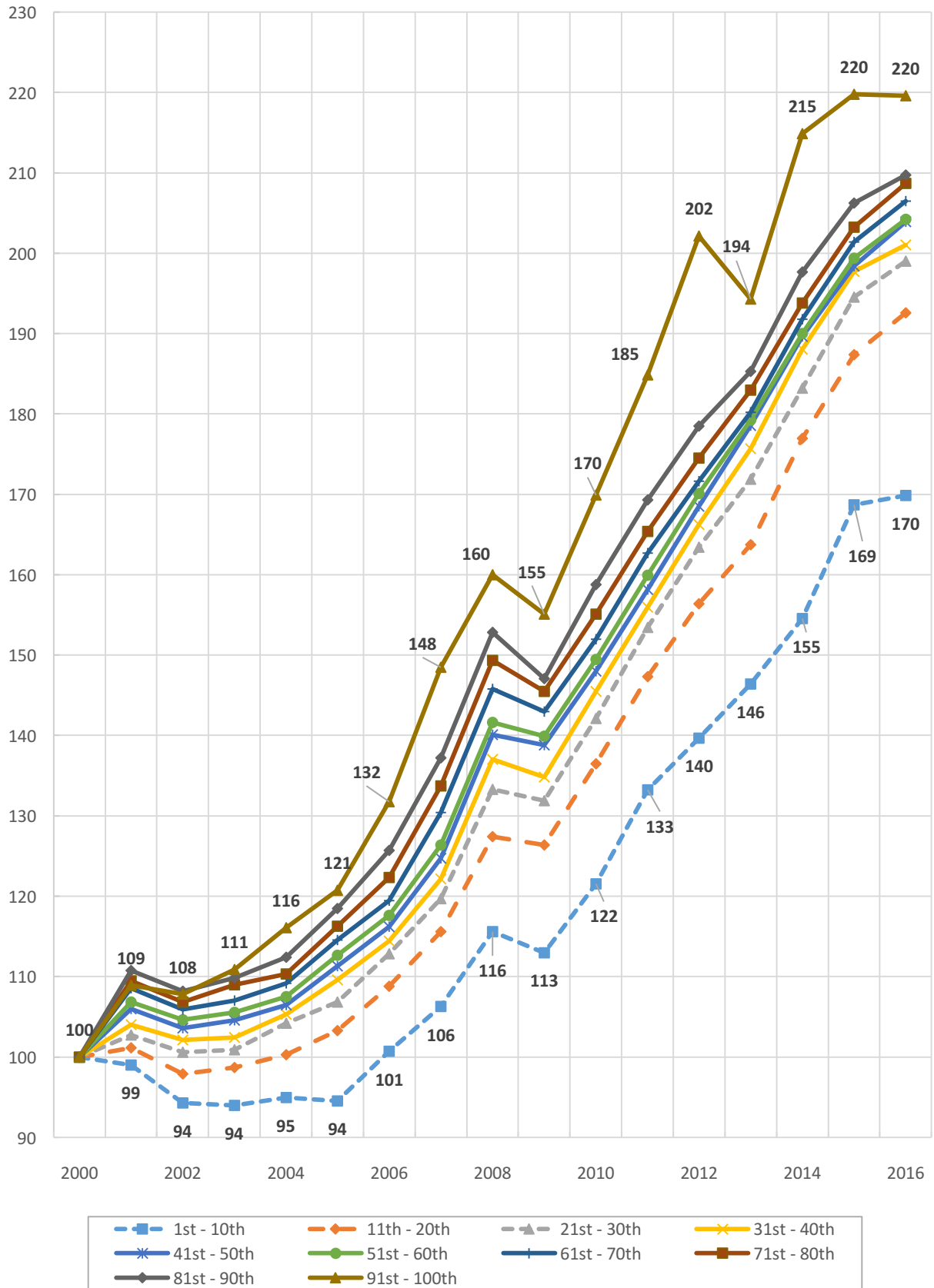


Figure 4: Indices of Average Monthly Income of Employed Residents by Deciles⁷

⁷ Ibid (See Appendix A4)

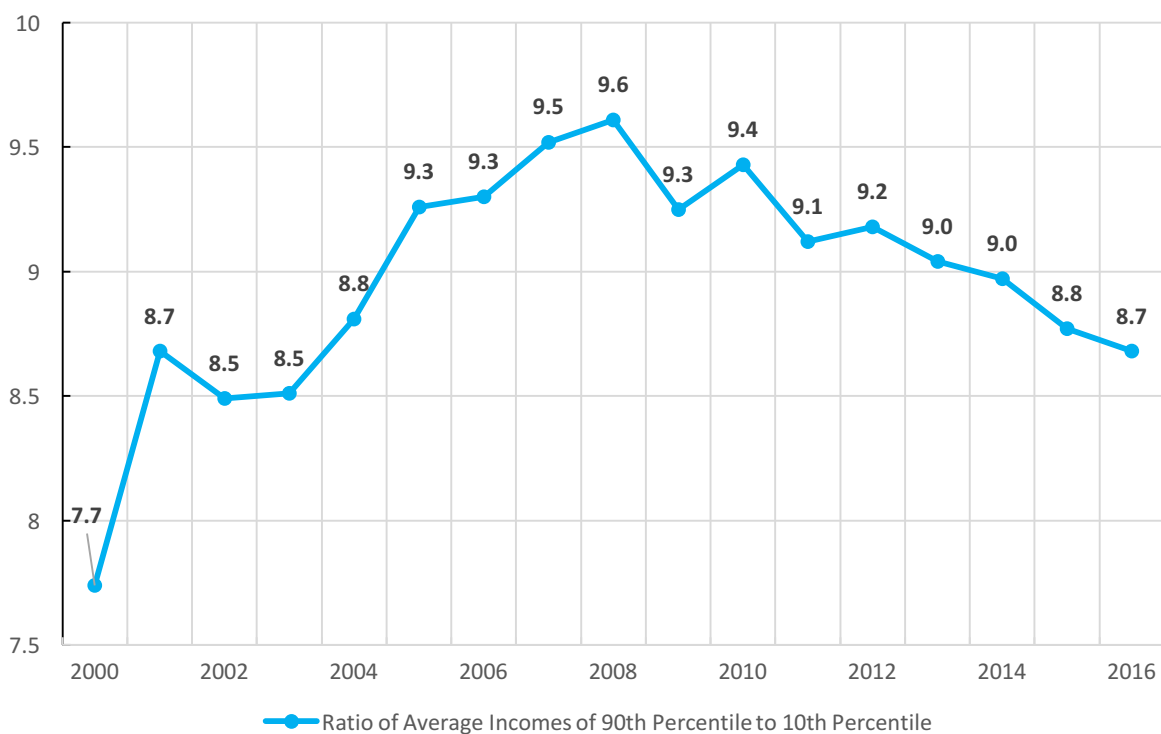


Figure 5: Ratio of Average Incomes at the 90th Percentile to 10th Percentile⁸

Although other advanced economies have likewise experienced large increases in inequality in recent years, these findings demonstrate that Singapore's case is unique and of particular significance in terms of the pace at which inequality has risen as well as the extent to which it has grown over the last two decades vis-à-vis other high-income countries. Collectively, the data suggests that majority of the overall increase in incomes – alongside their corresponding benefits – have been accrued by the top strata of society, with the poor seeing a disproportionately smaller share of the nation's prosperity. In relation to the theoretical debates on growth and equity presented in the literature review, this widening income gap indicates that conventional arguments that income inequality is self-correcting, and that growth would eventually 'trickle-down' to the poor, has not held in the case of Singapore.

Having analysed the historical trends of growth and income inequality, the next subsection draws on Wilkinson and Pickett's (2010) thesis and SSHP's methodological approach (NVPC, 2013) to assess the associated levels of societal wellbeing in terms of health and social outcomes.

⁸ Ibid (See Appendix A5)

4.2. Associated Levels of Societal Wellbeing in terms of Health and Social Outcomes

Broadly, despite Singapore's stellar economic growth, its overall wellbeing encompassing factors such as consumption, health, and income inequality seems to pale in comparison to other affluent countries. Cross-country research by Jones and Klenow (2016) shows that while Singapore's GDP per capita was 117 percent of that of the United States, its overall wellbeing – measured by consumption and adjusted for factors including leisure, longevity, and income inequality – came up to only half of that of the United States. As outlined in the methodology, this subsection examines the associated levels of societal wellbeing – along the dimensions of healthcare, familial relationships, and individual wellbeing – within the context of Singapore's economic growth and inequality.

Firstly, in terms of healthcare, historical data on Singapore's population is first reviewed to illustrate the demographic context of its healthcare needs. As shown in Figure 6, life expectancy has seen a steady incline from 78.0 years in 2000 to 82.9 years in 2016 – a positive sign in terms of health outcomes. With increased longevity, the proportion of elderly increased from 7.2 percent in 2000 to 12.4 percent in 2016, signalling that the population is ageing rapidly. Simultaneously, its old-age support ratio has fallen sharply from 9.0 in 2000 to 5.4 in 2016, indicating that the proportion of the economically active population supporting that of the inactive has fallen significantly. This suggests that demand for healthcare services and facilities – especially for the elderly – will rise, and that the ageing population will intensify strains on the working population. This is reflected in Figure 7, which shows an overall increase in hospital admissions from 390,368 in 2000 to 569,165 in 2016, with the proportion of hospital day beds utilised by the elderly rising from 35 percent to half over the same period.

Further, the latest available data indicates that rising costs of healthcare have increasingly been borne by the people. As displayed in Table 1, out-of-pocket health expenditure increased by 321 percent from 2000 to 2013, while that of government spending rose by 279 percent. The proportion of government health expenditure relative to GDP stood at 1.7 percent in 2013, which is not significantly higher than that of 1.2 percent in 2000 taking into account increased healthcare costs and inflation (Low and Gill, 2014; WHO, 2017). Singapore's levels of public health expenditure relative to GDP – which has ranged from 0.9 percent to 2.1 percent in the period from 2000 to 2014 – are exceedingly low in contrast to the OECD average of 8.9 percent (OECD, 2015; WHO, 2017).

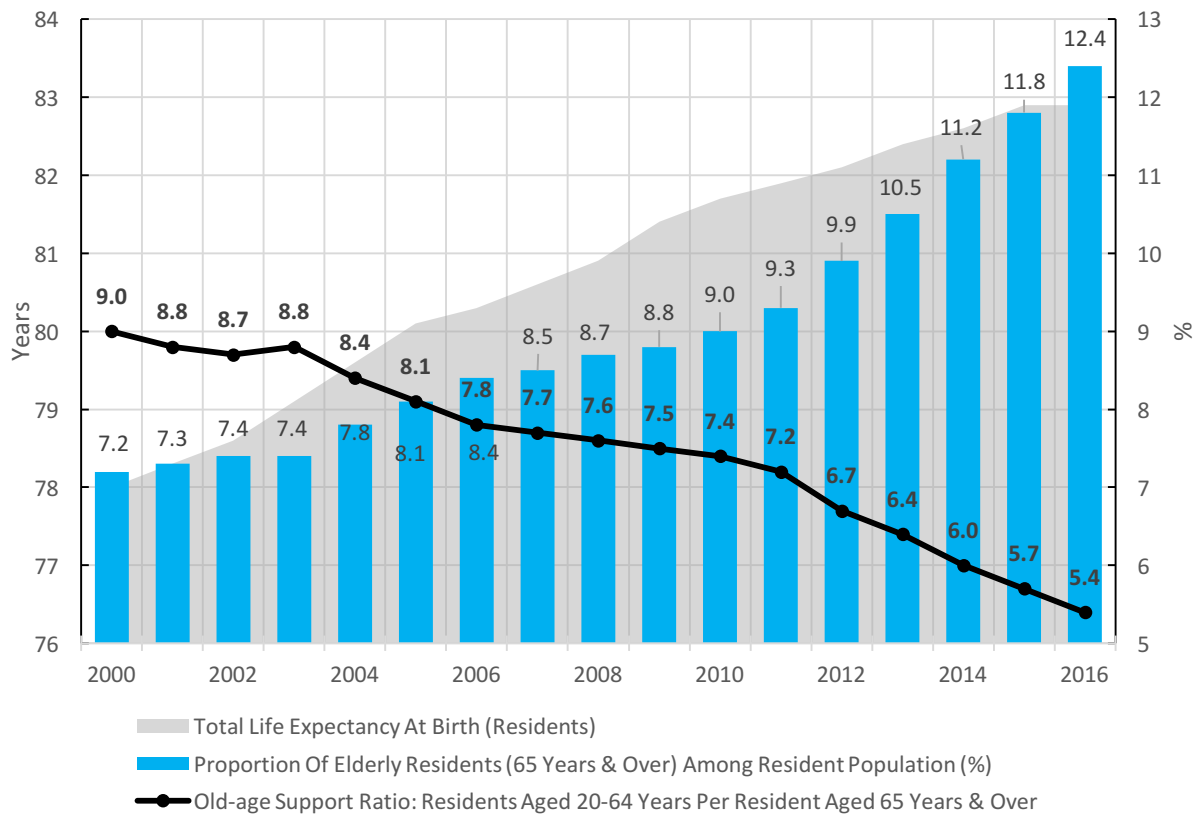


Figure 6: Life Expectancy, Proportion of Elderly Residents, and Old-age Support Ratio⁹

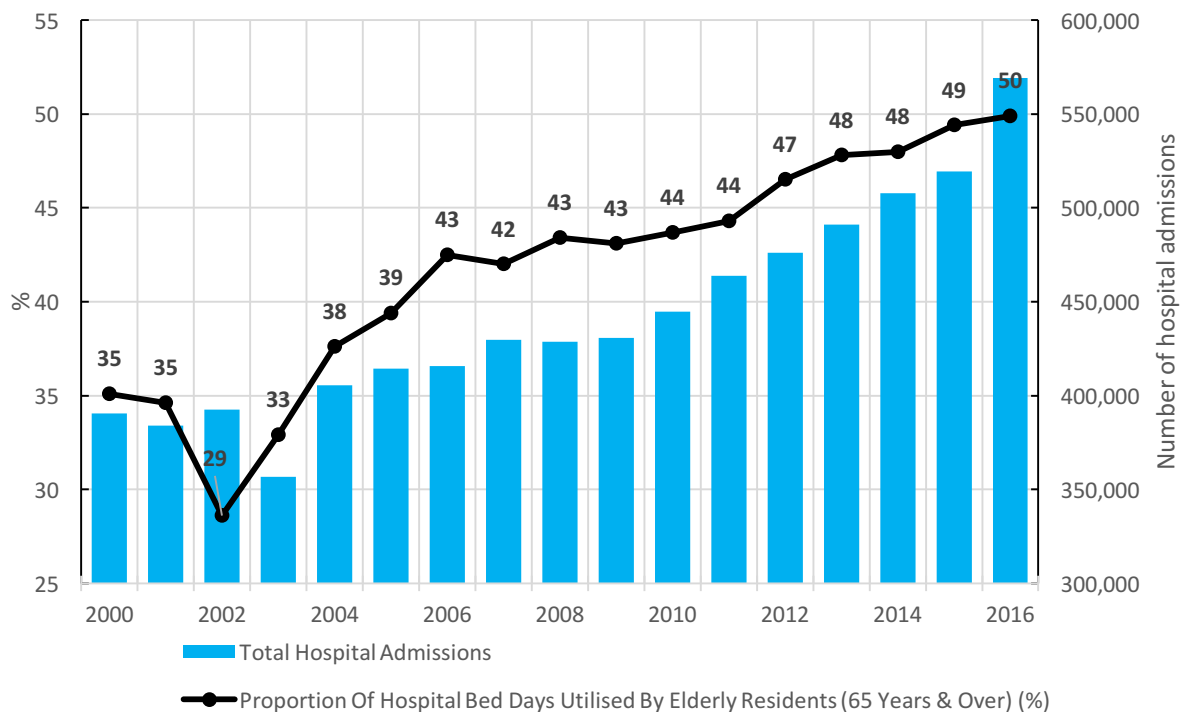


Figure 7: Hospital Admissions and Proportion of Hospital Day Beds Utilised by Elderly¹⁰

⁹ Ibid (See Appendix A6)

¹⁰ Ibid (See Appendix A7)

	Out-of-Pocket Health Expenditure per Capita (in USD millions)	Government Health Expenditure per Capita (in USD millions)
(1) 2000	348	291
(2) 2013	1,466	1,102
^{(2) - (1)} / ₍₁₎ ; % Increase	321%	279%

Table 1: Out-of-Pocket and Government Health Expenditure per Capita, as % of GDP¹¹

While Singapore fares well in terms of its high life expectancy, research shows that despite its robust growth, the provision of care services and facilities has not kept pace with rising healthcare demands arising from population ageing and the increased prevalence of chronic diseases such as diabetes and obesity (Lim, 2013). In view of its comparatively low levels of public healthcare expenditure, rising healthcare costs and the limited availability of healthcare services collectively create new barriers to healthcare access which disproportionately disadvantages the poor. This is reinforced by recent studies which indicate that healthcare access has become largely dependent on income levels (Abeysinghe, Himani, and Lim, 2011; Low and Gill, 2014), which serves to worsen existing inequality.

Secondly, in the dimension of familial relationships, statistics pertaining to marriage, fertility, and divorce are first examined. Figure 8 demonstrates that the trend of falling marriage rates has persisted over the last two decades from 8.1 percent in 1997 to 6.6 percent in 2016, while the median age of first marriages increased over the same period – from 28.4 to 30.3 for males, and 25.7 to 28.3 for females. Correspondingly, Table 2 shows that the proportion of singles has increased across the age groups of 20 to 24 years, 25 to 29 years, and 30 to 34 years, by 7.3 percent, 32.1 percent, and 26.7 percent respectively from 1997 to 2016. Total fertility rates have continued to decrease amid declining marriage rates, from 1.6 in 1997 to a low of 1.2 in 2016 (DOS, 2017). This signals that fewer couples are starting a family, or opting to have fewer children. In terms of divorces, the upward trend in divorce rates has continued from 1.6 percent in 1997 to 1.9 percent in 2016 (ibid). This suggests the weakening of marriage as an institution in Singapore, a phenomenon that has occurred in other developed countries (Davis and Van den Oever, 1982).

¹¹ Generated by author using WHO (2017) data

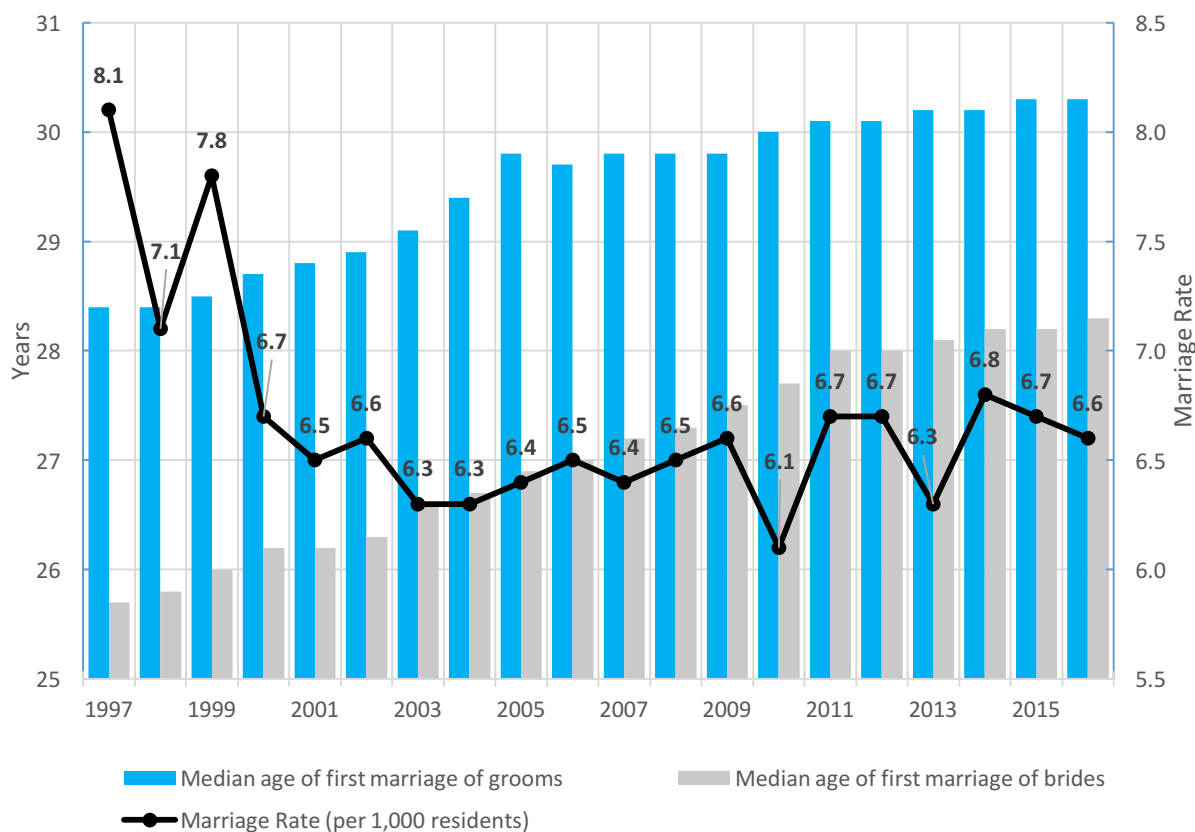


Figure 8: Median Age of First Marriages and Marriage Rate¹²

	Proportion of Singles Aged 20-24 Years (%)	Proportion of Singles Aged 25-29 Years (%)	Proportion of Singles Aged 30-34 Years (%)
(1) 1997	90.3	53.9	25.1
(2) 2017	96.9	71.2	31.8
^{(2) - (1)} / ⁽¹⁾: % Increase	7.3%	32.1%	26.7%

Table 2: Proportion of Singles by Age Group¹³

Sentiments from national surveys and other statistics reflect possible reasons accounting for these trends. Based on surveys conducted by the Ministry of Social and Family Development (MSFD) and National Family Council (NFC), a growing proportion of Singaporeans have expressed that long working hours have impeded them from spending desired time with their families (MSFD, 2015; NFC, 2016). More than half of the respondents across all age groups were reported to spend less than 10 hours weekly with their families (ibid). Among married

¹² Generated by author using DOS (2017) data (See Appendix A8)

¹³ Ibid

respondents, the number attesting to being satisfied with their marriages declined by four percent (*ibid*). Simultaneously, issues of family violence appear to be on the rise. The number of domestic abuse cases nearly doubled from 2012 to 2016 (Tan, 2016), with spousal abuse being identified as the most prevalent type of domestic violence (Tai, 2013). The number of personal protection orders filed against family members increased from an average of 2,750 in the three-year period of 2008 to 2011 (NVPC, 2013) to 3,200 in 2012 to 2015 (Chia, 2015). These findings suggest that in spite of overall increases in household income, the institutions of marriage and family appear to be deteriorating in recent years.

Thirdly, on individual wellbeing, indicators pertaining to levels of happiness and mental health are assessed. On first glance, Singapore seems to be performing well in terms of happiness levels, with it being ranked as the happiest country in the region according to the 2017 World Happiness Report (Helliwell, Layard, and Sachs, 2017). However, delving deeper into the methodology of the study, it appears that the key criteria employed for measuring happiness includes factors such as GDP per capita, healthy life expectancy at birth, and perceptions of corruption – areas in which Singapore has undoubtedly excelled (*ibid*). However, these criteria fail to capture the intricacies of individual wellbeing in terms of rising discontentment and falling levels of trust in government among the people – which has been acknowledged by Helliwell, Layard, and Sachs (2017) as one of the limitations of their approach. This suggests that Singapore's ranking may have been boosted by its high GDP per capita and life expectancy, and that other indicators should be examined to paint a more holistic account of wellbeing.

In view of this, a recent cross-country survey found Singapore ranking the lowest in terms of job satisfaction levels, with senior corporate executives emerging as the unhappiest within the labour force (Chua, 2016). With average annual working hours of 2,371 in 2016 – far exceeding that of other developmental states such as South Korea (2,113) and Japan (1,719) – Singaporeans not only face the longest working hours globally but also having to work the longest into their lifetimes (MOM, 2017a; OECD, 2017). In this context of increasing job dissatisfaction and proportion of work relative to life, the number of mental health related issues have grown in recent years. Suicide rates increased by 23 percent from 346 suicides in 2000 to 429 in 2016 (Samaritans of Singapore, 2017). The amount of outreach for crisis support to Samaritans of Singapore – the only suicide prevention centre nationally – grew considerably from 2012 to 2017, with an increase in the number of calls, text messages, and emails received

by 21 percent, 134 percent, and 119 percent respectively (ibid). Mental health disorders are also on the rise, with the Institute of Mental Health reporting an average increase of seven percent in the number of new patients annually (Chia, 2016). In terms of drug abuse, the number of new drug abusers arrested climbed from 911 in 2002 to 1,348 in 2016, nearly two-thirds of whom are youths under 30 years of age (Central Narcotics Bureau, 2002; 2016). Research by Chan et al (2000) finds that in Singapore's aggressive quest for growth, the rising emphasis on productivity and efficiency has contributed to significant levels of work stress and work-family conflicts. On a broader level, Singapore is found to hold the lowest levels of social trust among developed countries (Wilkinson and Pickett, 2010). These emerging social issues associated with the city-state's pursuit of growth have led prominent local author, Catherine Lim, to declare Singapore as "materially rich but spiritually poor" (Lim, 2008). Collectively, these findings indicate that while living standards have increased substantially through greater employment opportunities and incomes, this has concurrently created new forms of emotional distress and social distrust within society as a result of increased competition stimulated by the strong emphasis on growth.

Against the backdrop of Singapore's strong economic prosperity, the overall findings from this section have demonstrated that growth has not corresponded with a commensurate increase in overall levels of societal wellbeing in recent years, particularly in the realms of healthcare, familial relations, and individual wellbeing. Instead, Singapore's growth has come accompanied by significant levels of inequality, disproportionately low levels of individual satisfaction, and a growing set of associated health and social problems – a phenomenon that lies in tandem with Wilkinson and Pickett's (2010) theory that high inequality holds negative impact on societal wellbeing. Yeoh, Auyong, and Yeo (2016) argue that the state's approach of minimal welfare, particularly during the period of economic restructuring in the 1990s and 2000s, has led to the population becoming ill-equipped to cope with the social dislocations arising from rapid economic growth. That Singapore's rapid growth, if not well-managed, would hold detrimental side effects on society was anticipated in 1972 by Singapore's then-Minister of Foreign Affairs Sinnathamby Rajaratnam, who warned that Singapore's growth model – one that was intricately linked to the global system – would require levels of social, political, and cultural adaptations which its citizens may not be capable of (Rajaratnam, 1972). As evident from this paper's findings, such a predicament has since worsened, manifesting in levels of societal wellbeing incommensurate with its economic achievements.

PART IV: DISCUSSION

5.1. Evolving State Rhetoric and Social Compact

Having established that Singapore's robust economic growth has corresponded with significant inequality and incommensurately low levels of societal wellbeing, this subsection discusses the implications of these findings relative to the state's evolving rhetoric, efforts, and associated social compact.

The state's approach of keeping welfare minimal and emphasising the need for self-reliance is rooted in PAP's ideology of meritocracy, where the state would "provide all citizens with the same opportunities to make the best that they can of their available talents" (Goh, 2013, p.45). However, with inequality and associated social and health problems on the rise since the late nineties as uncovered in this paper's findings, the state began to adopt a nuanced approach to the social compact. Initiatives were introduced to redistribute budget surpluses to lower-income groups, with Singapore's then-PM Goh Chok Tong stating that "higher-income Singaporeans owe their success in part to the others who support our social compact ... and must, therefore, be prepared to lend a helping hand to those who are not so well off" (Goh, 2001). This marked a shift in the state's stance, broadening its scope to include a greater focus on inclusive growth and collective responsibility (Soh, 2016).

Following the watershed elections of 2011 where discontentment concerning inequality and associated social issues were surfaced, PM Lee Hsien Loong announced the state's increased efforts to address them, stating that: "We will do more to ... raise the incomes and the wealth of the low-income Singaporeans" (Lee, 2013). This stance was reinforced by Deputy Prime Minister (DPM) Tharman Shanmugaratnam, who articulated that the state will step up efforts to "help those who start with less, starting from young, and ensure that every citizen has a fair share in Singapore's success" (Shanmugaratnam, 2017). These signify critical shifts in the state's rhetoric – from providing *fair opportunities* for all in the past to placing more emphasis on ensuring *fair outcomes*.

Nonetheless, the state's focus on ensuring strong economic growth has continued to take foremost priority. In the words of Singapore's DPM and then-Finance Minister Shanmugaratnam: "To be able to help the poor, we must first create wealth ... The solution for

Singapore cannot be to grow slowly in order to reduce inequality” (Shanmugaratnam, 2008; 2010) – this reflects the state’s enduring stance of growth over equity, on the basis that “equity requires growth” (Low, 2014, p.21). As such, despite high inequality and increasing social costs, the state’s approach has remained fundamentally unchanged – one that is based on strong growth being key; self-reliance being essential to meeting individual needs; and state support being “the last resort” (Smith et al, 2015, p.42).

5.2. Policy Implications

The previous subsection has shown how the state’s rhetoric and social compact have gradually evolved, reflecting its increased acknowledgement of its need to play a more significant role in addressing rising inequality and the associated social and health problems. This subsection reviews the existing key policies aimed at addressing these issues, and discusses potential implications in relation to this paper’s findings. This is therefore not meant to be a comprehensive evaluation of Singapore’s social policies, but rather, it attempts to provide an analytical basis on which further research can be conducted.

Today, the key pillars of Singapore’s social security include the Central Provident Fund (CPF), workfare support, and healthcare assistance. CPF is a mandatory pension fund, to which Singaporeans and their employers contribute a sizable proportion of their wages. Its purpose is to provide financial security, and can be drawn on to finance housing and retirement (CPF, 2017). Singapore’s workfare support encompasses measures aimed at promoting work through wage supplements, skills development, and social support for low-income individuals already in employment (MOM, 2017b). Healthcare assistance comprises three tiers: Medisave, a mandatory savings programme intended to enable people to pay for their medical needs; MediShield, a compulsory insurance scheme aimed at covering costly medical treatments; and Medifund, a state-funded, means-tested scheme serving as a last option for individuals unable to foot their medical bills through the aforementioned schemes (MOH, 2017).

Indeed, the state has widened social support in recent years in tandem with its evolving stance. The slight decline in the Gini coefficient from 0.478 in 2012 to 0.458 in 2016 as illustrated earlier in Figure 2, and the consistent depression of the Gini coefficient after factoring in government taxes and transfers from 0.458 to 0.402 in 2016 (DOS, 2017), signify early indications of the state’s nascent efforts making some headway, which are commendable.

However, these efforts remain largely inadequate as evidenced by the continued rise in health and social problems associated with strong growth and inequality. Additionally, the limitations of the CPF system have resulted in the needs of lower-income groups not being met (Lee, 2001; Smith et al, 2015). For one, it completely excludes certain marginalised groups as it only supports those who have been in employment for a significant period of time (ibid). These groups include the self-employed, partially- or irregularly-employed, and those in low-paying groups – majority of whom fall in the poorer strata of society. Further, studies show that CPF savings are insufficient to provide for retirement even at high rates of contributions (Tat, 2013; Yeoh, Auyong, and Yeo, 2016). No national unemployment insurance is currently in place, indicating the increased vulnerability of the poor who are unable to secure work. Despite efforts to increase support for lower-income groups such as the Workfare Income Supplement (WIS), its design – which requires the unemployed to obtain work before being eligible for assistance – does not address underlying barriers to employment (Ng, 2015; Yeoh, Auyong, and Yeo, 2016). These limitations may therefore serve to exacerbate, rather than mitigate, inequality and worsen the associated health and social outcomes faced by the poor.

In the realm of healthcare, although Singapore's multi-tiered system has been lauded on its cost-effectiveness and flexibility, its capacity to meet the people's needs remains restricted. Studies show that existing schemes have proved inadequate in meeting increasing healthcare needs, and argue for state expenditure on healthcare to be substantially expanded for lower-income groups (Low and Gill, 2014; Ramesh, 1992; 2000). This is reinforced by this paper's findings, which show growing healthcare needs juxtaposed against rising healthcare costs, limited availability of care services and facilities, and low state expenditure on healthcare. Further, other aspects of Singapore's social security system also appear to be deteriorating. While its early housing policies were successful in redistributing wealth and enabling high ownership of public housing, increasing asset prices in recent years have reduced housing affordability. This has resulted in the rich purchasing more property which serves to increase their wealth, while the poor are increasingly unable to afford them (Smith et al, 2015). Concurrently, this has also led to a situation where an increasing proportion of elderly are asset-rich and cash-poor, with inadequate financial resources to meet their basic needs (Phang and Helble, 2016). In terms of education, its role as a significant social equaliser has gradually diminished in light of growing social stratification within public schools, with the profile of students attending the most prestigious public schools and receiving highly-regarded government scholarships being skewed towards those from higher-income families (Cheung,

2015; Ng, 2014). Collectively, these factors will exacerbate already high levels of inequality and its associated social and health outcomes as analysed in this paper, unless remedial action is promptly taken.

In this light, various scholars have called for the state to reconsider the longstanding paradigm of economic growth over equity to focus on ways to achieve both as dual objectives (Low, 2014; Ng, 2015, Yeoh, Auyong, and Yeo, 2016). The state's weakening political legitimacy and the fraying social contract between the state and people – manifested in the latter's rising discontentment and distrust most notably through the 2011 watershed elections – reinforce the urgency for action (Barr, 2016).

CONCLUSION

This paper began by painting the socioeconomic dilemma faced by Singapore today, where stellar economic success has increasingly come accompanied by rising inequality and discontentment within society. As with the fictional city of Omelas (Le Guin, 1973), Singapore's development over the past five decades has been underpinned by a social compact forged through the state's early achievements in facilitating its economic transformation and delivering quality public infrastructure and services. This allowed the state to promote the lasting rhetoric of "growth before sharing" (Pang, 1975, p.15), which has underpinned its economic and social strategies.

Studying the dark side of these choices, this paper first demonstrated that the pace at which inequality has risen in Singapore and the extent to which it has grown over the last two decades vis-à-vis other advanced economies have been strikingly significant. Based on empirical data, it established that overall increases in income associated with robust growth have been primarily accrued by the richest strata of society, while the poor experienced stagnating wages. This widening income gap serves as an indication that conventional theories of inequality being naturally self-correcting (Kuznets, 1955) and that growth would eventually trickle-down in favour of the poor (WB, 1985) have not held in the case of Singapore.

Delving deeper into associated levels of wellbeing, this paper has shown that strong growth has not corresponded with a commensurate increase in societal wellbeing in the recent years, particularly in the domains of healthcare, familial relations, and individual wellbeing. Despite its economic prosperity, public health expenditures were found to be exceedingly low relative to other developed countries. Factoring in rising healthcare costs and the inadequate supply of care services to meet growing demands arising from population ageing and increased incidence of illnesses, these factors create new barriers to healthcare access which disproportionately disadvantages the poor. Despite enhanced living standards through increased employment and incomes, the emphasis on productivity and efficiency to drive growth was found to be associated with a weakening of family and marriage as institutions; declining levels of individual satisfaction; and a rising prevalence of social and mental health issues as a result of greater stress and work-family conflicts. These findings are aligned with Wilkinson and Pickett's (2010) theory that high inequality has adverse impact on social and health outcomes.

In relation to these findings, this paper has reviewed the state's evolving rhetoric, efforts, and social compact. While the state has indeed begun to acknowledge these issues and widened social support in recent years, these efforts have remained largely inadequate given the continued rise in inequality and social costs; and the limitations of its social security system. Notwithstanding this, the state's focus on growth has continued to take foremost priority, premised on classical theories that growth is required to generate the necessary resources for promoting equity. Yet, this longstanding paradigm of growth over equity has clearly not seen Singapore's initial accomplishment of equitable growth continuing into recent decades.

Utilising a mixed-methods approach, this paper has sought to provide a nuanced perspective on the interlinkages between economic growth, inequality, and associated levels of wellbeing. Its findings hold significant implications. First, they highlight the need to acknowledge the severity of inequality in terms of the extent and pace at which it has grown in Singapore – an aspect not widely recognised today. Second, consistent with Wilkinson and Pickett's (2010) theory, they call for a greater alignment of Singapore's economic and social strategies given that strong growth has not corresponded with commensurate improvements in societal wellbeing. Third, they point to early indications of the state's nascent efforts to address the associated health and social issues making some headway, and underline the urgency of fundamentally re-examining the enduring paradigm of growth over equity. Collectively, these implications hold not only for Singapore's future development, but are also noteworthy for other developmental states facing similar socioeconomic dilemmas; as well as developing countries aspiring to Singapore as a model – particularly in terms of the price of its prosperity.

In all, this paper has demonstrated that Singapore's economic success has come accompanied by significant inequality and incommensurately low levels of societal wellbeing vis-à-vis other developed countries. While the state has fundamentally remained firm on its paradigm of growth over equity, its nascent efforts to address these issues are commendable in terms of the direction towards which it is shifting. Whether or not Singapore's hard-earned economic growth and social stability can be sustained moving forward will therefore depend on the extent and commitment with which it adopts a deliberate, concerted approach – rather than “piecemeal reforms” (Yeoh, Auyong, and Yeo, 2016, p.82) – to continually recalibrate and redesign its economic and social strategies to meet evolving needs.

APPENDIX

A1. SSHP's Nine Domains of Social Health Measurements¹⁴

Domain	Desired Outcome Statement
Healthcare	People live and enjoy long and healthy lives. Every individual has adequate access to affordable and quality healthcare.
Family	Families not only stay together, they enjoy strong relational ties and support one another in times of need. Families are able to fulfil their responsibilities and act as the first line of care and support in society.
Individual Wellbeing	Individuals in our society are resilient. They have opportunities to lead happy and fulfilling lives, while enjoying greater engagement and satisfaction at work.
Education	The educational system caters to a wide diversity of abilities and learning styles among our children. It fosters a love for learning, inspires greater curiosity and creativity, and helps prepare our children for the future.
Income Security	Singaporeans are able to earn a living wage, with lower income Singaporeans feeling that their children have a good chance of enjoying social mobility in Singapore. Singaporeans are also adequately prepared for old age and are able to cope with contingencies.
Social Connectedness and Community Cohesion	There is a high level of trust, openness and interaction among individuals, regardless of their backgrounds. People have constructive relationships with others in public spaces, neighbourhoods, workplaces, and other communities.
Housing and Transport	Every Singaporean is able to afford a home that is part of an engaged community, and has access to a transportation system that is reliable, efficient and inclusive.
Civil and Political Participation	People exercise their civil and political rights. Individuals are empowered to take collective action for positive social transformation.
Culture and Values	Singaporeans share a unique and strong national identity. They have a sense of loyalty and belonging to the country. People show empathy and graciousness towards each other, and there is a sense of shared purpose in the nation. People appreciate their own heritage and support local art.

¹⁴ Table replicated from NVPC (2013)

A2. Raw data on Real GDP Growth Rate, Wage Share, and Gini Coefficient¹⁵

	Real GDP growth rate	Wage share of GDP	Gini coefficient
1997	8.3%	40.4%	0.412
1998	-2.2%	43.3%	0.410
1999	6.1%	42.0%	0.424
2000	8.9%	41.6%	0.442
2001	-1.0%	44.7%	0.454
2002	4.2%	43.9%	0.454
2003	4.4%	43.2%	0.457
2004	9.5%	39.8%	0.460
2005	7.5%	39.2%	0.465
2006	8.9%	39.2%	0.470
2007	9.1%	39.0%	0.482
2008	1.8%	41.1%	0.474
2009	-0.6%	41.3%	0.471
2010	15.2%	39.1%	0.472
2011	6.2%	39.2%	0.473
2012	3.9%	40.1%	0.478
2013	5.0%	41.1%	0.463
2014	3.6%	42.8%	0.464
2015	1.9%	43.3%	0.463
2016	2.0%	44.6%	0.458

¹⁵ Author's computations using data from DOS (2017)

A3. Raw Data on Average Monthly Household Income from Work (Excluding Employer CPF Contributions) Among Resident Employed Households per Household Member by Deciles (in Singapore dollars)¹⁶

Year	1st - 10th	11th - 20th	21st - 30th	31st - 40th	41st - 50th	51st - 60th	61st - 70th	71st - 80th	81st - 90th	91st - 100th
2000	291	493	660	831	1,017	1,242	1,515	1,901	2,569	5,107
2001	289	499	678	865	1,078	1,327	1,645	2,081	2,844	5,561
2002	275	483	663	849	1,053	1,299	1,605	2,030	2,779	5,505
2003	274	487	665	852	1,063	1,311	1,622	2,072	2,822	5,664
2004	277	495	687	875	1,082	1,335	1,654	2,097	2,888	5,930
2005	275	510	705	911	1,131	1,399	1,736	2,210	3,043	6,167
2006	293	537	744	952	1,182	1,461	1,810	2,325	3,229	6,730
2007	310	570	789	1,015	1,268	1,569	1,977	2,542	3,525	7,584
2008	337	629	879	1,139	1,424	1,759	2,209	2,838	3,926	8,171
2009	329	623	870	1,121	1,411	1,737	2,166	2,765	3,778	7,921
2010	354	673	937	1,210	1,505	1,856	2,302	2,948	4,078	8,678
2011	388	727	1,012	1,297	1,608	1,986	2,465	3,144	4,349	9,440
2012	407	771	1,078	1,382	1,713	2,112	2,601	3,317	4,585	10,325
2013	427	808	1,134	1,461	1,816	2,225	2,731	3,478	4,759	9,923
2014	450	873	1,208	1,563	1,928	2,359	2,906	3,684	5,077	10,975
2015	492	924	1,283	1,644	2,017	2,475	3,052	3,863	5,298	11,226
2016	495	950	1,313	1,671	2,073	2,536	3,129	3,967	5,388	11,216

¹⁶ Source: DOS (2017)

A4. Computed Indices of Average Monthly Household Income from Work (Excluding Employer CPF Contributions) Among Resident Employed Households per Household Member by Deciles¹⁷

Year	1st - 10th	11th - 20th	21st - 30th	31st - 40th	41st - 50th	51st - 60th	61st - 70th	71st - 80th	81st - 90th	91st - 100th
2000	100	99	94	94	95	94	101	106	116	113
2001	100	101	98	99	100	103	109	116	127	126
2002	100	103	101	101	104	107	113	120	133	132
2003	100	104	102	102	105	110	114	122	137	135
2004	100	106	104	105	106	111	116	125	140	139
2005	100	107	105	106	107	113	118	126	142	140
2006	100	109	106	107	109	115	119	130	146	143
2007	100	109	107	109	110	116	122	134	149	145
2008	100	111	108	110	112	118	126	137	153	147
2009	100	109	108	111	116	121	132	148	160	155
2010	100	99	94	94	95	94	101	106	116	113
2011	100	101	98	99	100	103	109	116	127	126
2012	100	103	101	101	104	107	113	120	133	132
2013	100	104	102	102	105	110	114	122	137	135
2014	100	106	104	105	106	111	116	125	140	139
2015	100	107	105	106	107	113	118	126	142	140
2016	100	109	106	107	109	115	119	130	146	143

¹⁷ Author's computations using data from DOS (2017)

A5. Raw Data on Ratio of Average Incomes at the 90th Percentile to 10th Percentile¹⁸

Year	Ratio of Average Incomes of 90th Percentile to 10th Percentile
2000	7.74
2001	8.68
2002	8.49
2003	8.51
2004	8.81
2005	9.26
2006	9.30
2007	9.52
2008	9.61
2009	9.25
2010	9.43
2011	9.12
2012	9.18
2013	9.04
2014	8.97
2015	8.77
2016	8.68

¹⁸ Source: DOS (2017)

A6. Raw Data on Life Expectancy, Proportion of Elderly Residents, and Old-age Support Ratio¹⁹

Year	Total Life Expectancy At Birth (Residents)	Proportion Of Elderly Residents (65 Years & Over) Among Resident Population (%)	Old-age Support Ratio: Residents Aged 20-64 Years Per Resident Aged 65 Years & Over
2000	78.0	7.20	9.00
2001	78.3	7.30	8.80
2002	78.6	7.40	8.70
2003	79.1	7.40	8.80
2004	79.6	7.80	8.40
2005	80.1	8.10	8.10
2006	80.3	8.40	7.80
2007	80.6	8.50	7.70
2008	80.9	8.70	7.60
2009	81.4	8.80	7.50
2010	81.7	9.00	7.40
2011	81.9	9.30	7.20
2012	82.1	9.90	6.70
2013	82.4	10.50	6.40
2014	82.6	11.20	6.00
2015	82.9	11.80	5.70
2016	82.9	12.40	5.40

¹⁹ Source: DOS (2017)

A7. Raw Data on Hospital Admissions and Proportion of Hospital Day Beds Used by Elderly²⁰

Year	Total Hospital Admissions	Proportion Of Hospital Bed Days Utilised By Elderly Residents (65 Years & Over) (%)
2000	390,368	35.1
2001	384,054	34.6
2002	392,489	28.6
2003	356,535	32.9
2004	405,354	37.6
2005	414,367	39.4
2006	415,833	42.5
2007	429,744	42.0
2008	428,591	43.4
2009	430,573	43.1
2010	444,757	43.7
2011	463,799	44.3
2012	476,094	46.5
2013	491,027	47.8
2014	507,814	48.0
2015	519,545	49.4
2016	569,165	49.9

²⁰ Source: DOS (2017)

A8. Raw Data on Median Age of First Marriages (By Gender) and Marriage Rate²¹

Year	Marriage Rate (per 1,000 residents)	Median age of first marriage of grooms	Median age of first marriage of brides
1997	8.10	28.4	25.7
1998	7.10	28.4	25.8
1999	7.80	28.5	26.0
2000	6.70	28.7	26.2
2001	6.50	28.8	26.2
2002	6.60	28.9	26.3
2003	6.30	29.1	26.6
2004	6.30	29.4	26.7
2005	6.40	29.8	26.9
2006	6.50	29.7	27.0
2007	6.40	29.8	27.2
2008	6.50	29.8	27.3
2009	6.60	29.8	27.5
2010	6.10	30.0	27.7
2011	6.70	30.1	28.0
2012	6.70	30.1	28.0
2013	6.30	30.2	28.1
2014	6.80	30.2	28.2
2015	6.70	30.3	28.2
2016	6.60	30.3	28.3

²¹ Source: DOS (2017)

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