

Trends in the Cost of Living in South Africa between 2011 and 2023

2025



# Contents

1.	Intr	oduction	∠
2.	Pov	erty and Inequality in South Africa, 2011-2023	5
_,	2.1.	Measuring Poverty	
	2.2.	Poverty in South Africa	
		<ul><li>2.2.1. Absolute Poverty Measures</li><li>2.2.2. Poverty in South Africa since 2011</li></ul>	6
		2.2.3. Working Poverty in South Africa since 2011	
		2.2.4. Households with and without Children in South Africa since 2011	16
	2.3.	Inequality in South Africa	
	2.4. 2.5.	Inflation Trends	
_			
3.	3.1.	Mes	
	5.1.	3.1.1. Trends in Household Income	
		3.1.2. Income by Household Characteristics	
	3.2.	Income Sources	31
		3.2.1. Key Income Sources	31
		3.2.2. Wage Trends	
	3.3.	Summary	
4.		t of Basic Services	
	4.1. 4.2.	Expenditure Patterns across the Income Distribution Education	
	4.3.	Food	
	4.4.	Utilities	
	4.5. 4.6.	TransportFree Basic Services	
	4.7.	Inflation and Wages	49
	4.8.	Summary	
5.	Acc	ess to Basic Services	
	5.1. 5.2.	HousingHousehold Assets	
	5.3.	Utilities and Services	
		5.3.1. Overall Access to Utilities	
		5.3.2. Water and Sanitation	
		5.3.4. Refuse Removal	
		5.3.5. Communications	68
		5.3.6. Transport	
		5.3.8. Education-Related Travel Patterns	71
		5.3.9. Education	
		5.3.11. School Education	
		5.3.12. Post-Secondary Education	76
		5.3.13. Health and Social Development	
		5.3.15. Medical Aid	79
		5.3.16. Food Security	
	5.4.	Summary	82
6.	Con	clusion	84
7.	Refe	erences	86
8.	Арр	endix	91

# Key Findings

The National Development Plan (NDP, 2012) recognises the need to address poverty and inequality by reducing the cost of living, emphasising the importance of affordable essential goods and services, and access to quality education and healthcare. However, recent challenges, including COVID-19 lockdowns, supply chain disruptions, fuel price increases, and rising interest rates, have intensified concerns about the cost of living. Government's ability to mitigate the impact of these pressures is constrained by ongoing fiscal limitations, limiting its capacity to provide adequate support to households struggling with rising costs. Economic growth in South Africa between 2011 and 2023 has also been low, averaging just 1.0 per cent annually (SARB, 2024), and this period has been characterised by limited improvements in living standards, subdued job creation, and stagnant wage growth.

Against this backdrop, this research investigates the impact of the cost of basic goods and services on the cost of living for poor and working poor households between 2011 and 2023. The research is informed by three groups of research questions, focusing on the provision of basic services, incomes, and the cost of living.

The findings reveal a nuanced picture of progress amid enduring challenges.

- Poverty rates in 2023 are broadly similar to those in 2011 across various groupings. Despite some improvements in the early part of the 2010s, the second half of the decade generally saw slight deteriorations in poverty rates. COVID-19 coincided with significant increases in poverty, with only slow and marginal improvements observed since. Households with children experience higher poverty rates than those without. However, it is important to recognise that the GHS data is not ideal for accurately measuring money-metric poverty, and the results rest on a reconstructed household income variable.
- **Employment is crucial for escaping poverty.** Employed individuals have significantly lower poverty rates than the rest of the population. This is despite the fact that poverty status is determined at the household level; the wages of the employed are often sufficient to ensure that households are not poor.
- The value of secondary education in the labour market has diminished. This is evidenced by an 8.6 per cent rise in the proportion of the working poor with completed secondary schooling, likely due to increasing numbers of job seekers with a matric certificate and relatively weak demand for workers with this qualification.
- **Regional economic disparities persist.** Gauteng attracts job seekers but shows higher rates of unemployed poor, while KwaZulu-Natal grapples with a larger proportion of working poor, suggesting lower wages or more limited opportunities.
- **Real wages declined over the period.** Real wages contracted each year at an average of 0.3 per cent, resulting in an overall decline in real wages in 2023 compared to 2011.
- The Gini coefficient remains elevated at 0.63 as of 2023. Despite a marginal decrease in overall inequality, with employed groups experiencing a 7.1 per cent reduction compared to a 4.5 per cent decrease nationally, inequality remains high. The income structure shows little change, with disadvantaged households still heavily reliant on government grants. Here too, however, the data is not ideal for accurate measurement, especially given that high incomes were often capped.
- The composition of household income has remained largely unchanged over the period. Overall, wages and salaries account for nine-tenths of household income, confirming the importance of labour market income for escaping poverty. Poor households continue to rely heavily on grants, whereas wealthier households depend on earnings from labour. This reliance on labour income for pensions

means that poor households, unable to accumulate pension savings, increasingly depend on grants during retirement.

- Social assistance has expanded, with the number of grants paid by the state increasing by 26.2 per cent from 2010/11 to 2022/23. This has been critical in supporting households at the bottom end of the income distribution. While grant values are regularly adjusted for inflation over time, comparison with the headline consumer price index suggests marginal real declines for the old-age grant, war veterans grant, disability grant, and care dependency grant, while there has been a slight gain in real terms for the child support grant and grant-in-aid. However, the foster care grant has lost almost a fifth of its value in real terms over the period. Importantly, comparisons of grant values with other price indices that are more reflective of the consumption patterns of poor households (such as the decile one CPI or the food CPI) suggest much more significant declines in the real values of social grants.
- Education and healthcare accessibility face mounting challenges due to rising costs and resource constraints. The education gap has widened, and public health facilities are increasingly overburdened. Food affordability has deteriorated, with poorer households more susceptible to food insecurity.
- Housing trends reflect ongoing socioeconomic divisions, with a shift towards urban living and formal dwellings. While access to basic services expanded, quality declined, particularly impacting poor communities. Urban sprawl and inadequate public transport exacerbate living expenses for lowincome groups.
- **Cost of living pressures intensified.** This was driven by an average inflation rate of 5.2%. Essential expenses like education, food, and transport saw price hikes far exceeding the national average, straining household budgets.
- The provision of free basic services has the effect of reducing pressure on poor households' budgets, while also insulating them from price increases for these services by reducing the weight of these services within their expenditure bundles. However, the most recent data from municipalities suggests a scaling back in the provision of free basic services, with all four services seeing reductions in the number of households benefiting over the 2011-2023 period.

## **DISCLAIMER**

The views expressed in this report are that of the authors based on their research and analysis, and do not reflect the view of the National Planning Commission.

# Limitations

This study relies on multiple data sources, including national surveys and inflation data derived from national inflation statistics. To improve transparency and enhance the readability of this report, we note some limitations with respect to its findings.

## 1. Data source variability and temporal misalignment

This study draws from multiple data sources, including household surveys and government statistics, each with its own strengths and limitations. Data release schedules vary, with some providing real-time data while others have significant lags. Moreover, data may be outdated, especially if surveys are conducted infrequently. In some instances, surveys occurred only once during the study period.

## 2. Inflation data complexities

Inflation data, while crucial to this analysis, comes with several inherent complexities. The CPI basket is based on a representative selection of goods and services. However, public releases of the data do not allow for significant interrogation at sufficiently detailed levels to draw robust conclusions at detailed levels of disaggregation. This is noted as a serious limitation of the study. We attempted to overcome this challenge by requesting additional data from StatsSA. Where possible, StatsSA provided additional disaggregated data for this study.

#### 3. External factors

Major economic shocks during the study period, including the COVID-19 pandemic years of 2020 and 2021, may create anomalies in the data that distort quality and outcomes, impacting the insights presented. These have been acknowledged where possible to alert readers to potential variations from observed trends over time. For example, due to pandemic-related constraints, the General Household Survey (GHS) collected data on a reduced set of questions in 2020 and 2021, which may affect the comprehensiveness of the data for these years.

#### 4. Household survey data

Household survey data is subject to several biases, including sampling bias, where certain groups may be underrepresented or excluded, and non-response bias, where households may refuse to participate or not answer certain questions. Additionally, measurement errors can occur when respondents provide inaccurate or inconsistent answers, particularly for sensitive topics like income or expenditure. Social desirability bias can also skew results, as respondents may provide answers that are socially acceptable rather than truthful. Recall bias can lead to inaccuracies, as respondents may forget or misremember past events or expenditures. Moreover, data quality issues can arise from errors during data collection, entry, or processing, affecting accuracy. Finally, surveys may have limited coverage, failing to capture all aspects of household behaviour, income, or expenditure, which can result in an incomplete picture of the population being studied.

# 1. Introduction

The National Development Plan (NDP, 2012) recognises the need to address poverty and inequality by reducing the cost of living, emphasising the importance of affordable essential goods and services, and access to quality education and healthcare. However, recent challenges, including COVID-19 lockdowns, supply chain disruptions, fuel price increases, and rising interest rates, have intensified concerns about the cost of living. The government's ability to mitigate the impact of these pressures is constrained by ongoing fiscal limitations, restricting its capacity to provide adequate support to households struggling with rising costs. Economic growth in South Africa between 2011 and 2023 has also been low, averaging just one per cent annually (SARB, 2024), and the period has been characterised by limited improvements in living standards, subdued job creation, and stagnant wage growth.

Against this backdrop, this research investigates the impact of the cost of basic goods and services on the cost of living for poor and working poor households between 2011 and 2023. The research is informed by three groups of questions, focusing on the provision of basic services, incomes, and the cost of living.

#### These are:

- 1. What are the trends in access to, and costs of, basic services (electricity, water, transport, education, health, and food) from 2011 to 2023, and how have these affected the cost of living for poor and working poor households?
- 2. What factors have contributed to changing trends for households with employed individuals versus those with unemployed individuals over the same period?
- **3.** What are the impacts on households with children compared to those without, and what are the gender impacts?
- **4.** Have wages and other income (including social grants) increased in real terms for low-paid working individuals (working poor)?
- 5. What are the trends in income shares across the income distribution from 2011 to 2023?
- **6.** Has the cost of living for poor and working-class households decreased or increased over the decade under review (2011 to 2023)?

In answering these questions, this report firstly provides a comprehensive picture of the success the government has had in providing basic services (such as electricity and water) to most of the country. Secondly, the report identifies how the costs of basic services have affected poverty in South Africa, as well as the main drivers of those costs. Thirdly, it examines real income trends in South Africa, particularly wages and social grants: the former being a key factor underpinning poverty and inequality in South Africa, and the latter representing a vital intervention addressing these issues.

# 2. Poverty and Inequality in South Africa, 2011-2023

# 2.1. Measuring Poverty

To assess the poverty status of individuals and households, a clear definition of poverty is essential. Poverty can be defined in monetary or non-monetary terms. Monetary poverty is defined and measured in terms of monetary amounts or values, such as income or expenditure that falls below a specified currency amount (a poverty line). Non-monetary measures of poverty are based on other dimensions of well-being, such as health or access to basic goods and services. Poverty is commonly measured in absolute terms, relative terms, subjective terms, or multidimensionally.

Absolute poverty is defined in terms of a fixed income threshold below which individuals or households are considered poor. The threshold is usually set at a level deemed necessary to meet basic needs such as food, shelter, and clothing. An example of an absolute poverty line is the current international poverty line used by the World Bank of \$2.15 per day (in 2017 Purchasing Power Parity terms) (Jolliffe et al., 2022). Many countries also have their own national poverty lines based on their unique economic conditions and social norms. For example, in Ethiopia, the extreme poverty line is set at US\$2.04 per day, while in Turkey it is set at US\$7.63 per day, and in the United States, it is \$24.55 per day (Jolliffe et al., 2022).

Relative poverty measures define poverty in relation to the overall distribution of income or wealth within a society. For example, individuals might be considered to be in relative poverty if their income is less than 50 per cent of the median income in their country. An alternative relative poverty measure may define as poor those individuals who are members of the poorest 40 per cent of households.

Unlike objective measures of poverty that may use income or consumption figures, subjective poverty relies on individuals' perceptions regarding their economic well-being. Surveys or questionnaires are used to ask individuals about their ability to afford basic goods and services, their perception of their position in the distribution, or their views on the minimum income required to make ends meet.

More recently, a multidimensional approach to poverty measurement has gained importance, recognising that poverty goes beyond income and should consider access to essential services and opportunities. Multidimensional poverty measures the extent of deprivation across multiple dimensions of well-being, such as education, health, housing, water, and sanitation (UNICEF, 2021). The recognition of services as part of understanding poverty is due to their key role in the development of a well-functioning society. Broader access to services results in positive externalities for society. For example, increased access to healthcare services will likely reduce contagious diseases and lower child mortality (Lanau et al., 2020). Universal access to services also helps narrow the gap between the richest and poorest households (at least in terms of access to services), as everyone, regardless of wealth, has access to the same schools, transportation, and healthcare facilities. However, one challenge with expanding services is that public expenditure on such services tends to favour the non-poor over the poor, particularly in low-income countries (Lanau et al., 2020). This is largely due to the expansion of services being easier in urban areas where the non-poor tend to live than in rural areas, where poorer residents typically reside.

Overall, the choice of poverty measure depends on the analysis's purpose, the available data, and the context in which poverty is being assessed. It is important to recognise the limitations of any single measure and to use a combination of indicators to gain a comprehensive understanding of poverty.

# 2.2. Poverty in South Africa

#### 2.2.1. ABSOLUTE POVERTY MEASURES

Statistics South Africa publishes three national poverty lines – a food poverty line, a lower-bound poverty line, and an upper-bound poverty line – which are updated annually to reflect changing prices and expenditure patterns (Figure 1). In 2023, the food poverty line was set at R760 per person per month, while the lower-bound and upper-bound poverty lines were set at R1,058 and R1,558 per person per month, respectively (Statistics South Africa, 2023). The food poverty line represents the minimum cost per person required to achieve caloric sufficiency (i.e., the recommended minimum number of calories needed per day) and is considered the threshold for extreme poverty. The lower-bound poverty line is calculated as the food poverty line plus expenditure on non-food items for households whose total expenditure equals the food poverty line. The upper-bound poverty line is calculated as the food poverty line plus expenditure on non-food items for households whose food expenditure equals the food poverty line.

2006 2007 2008 2009 2010 2011 2012 2013 2014 2015 2016 2017 2018 2019 2020 2021 2022 2023 Lower-bound poverty line (LBPL) Upper-bound poverty line (UBL) Food poverty line (FPL)

FIGURE 1. Inflation-adjusted national poverty lines (per capita per month), 2006-2023

Source: Statistics South Africa (2023).

Note: Figures are per person per month in Rands. From 2006 to 2014, values are expressed in March prices for the respective years; from 2015 to 2022, they are expressed in April prices; and in 2023, values are expressed in May prices.

### 2.2.2. POVERTY IN SOUTH AFRICA SINCE 2011

In profiling poverty, this analysis relies on indices developed by Foster, Greer, and Thorbecke (1984). The FGT indices quantify the level of poverty within a population, measuring not only the incidence of poverty but also its depth and severity (Foster et al., 2010). The three most commonly used FGT measures are the headcount ratio, the poverty gap index, and the squared poverty gap index.

## **BOX 1:** Deriving the Household Income Variable

This study primarily uses the General Household Survey (GHS) from 2011 to 2023. The GHS is representative at national, provincial, and metro levels and has been collected annually since 2002.

Household income is a crucial variable for this study as it underpins measures of inequality. In the GHS data, household income comprises salaries/wages, income from a business, remittances, pensions, grants, sales of farm products and services, and other incomes (e.g. rental income and interest). The StatsSA-derived household income variable estimates total household income for households with a monthly income of less than R20,000. This estimate combines earnings from salaries, grants, remittances, and pensions and can be reconstituted by the researcher during data analysis.

"... estimated monthly incomes of R20,000 and higher were capped at R20,000, as the survey was not designed to capture incomes from more complex source"

According to the metadata, estimated monthly incomes of R20,000 and higher were capped at R20,000, as the survey was not designed to capture incomes from more complex sources, such as rental income and interest, typical of higher-income households. This data truncation creates a limitation, resulting in a loss of information on high-income households and constraining the extent of analysis that can be conducted on the dataset. However, the published data reveals that this cap has shifted over

time. The cap was adjusted in 2013 and again in 2015, raised each time by R10,000. It was adjusted annually from 2020, suggesting that there is no longer a cap on the variable.

To overcome this issue of capping, household income is divided into four sources: grants, wages, pensions, and remittances. The wage data consists of point estimates of wages, bracket responses, and missing data (no point estimates provided). Following Wittenberg (2017), Kerr and Wittenberg (2019), and Kohler and Bhorat (2023), we impute wages for the bracket and missing wages. First, to detect outliers, we employ a studentised regression residual approach and set these outliers to missing. We estimate an expanded Mincerian wage regression of the logarithm of monthly wages on a vector of observable covariates using Ordinary Least Squares (OLS), predicting the residuals, and flagging observations with large residuals as outliers. The limitation of the GHS is that we do not have the occupation and industry variable because the GHS is not designed to capture detailed labour market information. Nonetheless, we use a vector of observable covariates, which includes years of education, experience, experience squared, gender, race, province, rural-urban status, and marital status for the working-age population. After running the Mincerian wage regression, our residuals are concentrated around zero and appear randomly distributed across the fitted values, suggesting that both linearity and homoscedasticity hold. We then set wages to missing for those with absolute studentised residuals of more than three. This condition is widely used in the literature (Kohler and Bhorat, 2023; Wittenberg, 2017; Kerr and Wittenberg, 2019; Steven, 1984). These missing values will be imputed together with the missing wage data.

Second, we employ a multiple imputation (MI) approach to impute the exact wage values for workers who: (i) reported their bracket; (ii) reported neither their exact wage nor their bracket (i.e., those recorded as 'don't know' or 'refusal'); and (iii) those flagged as outliers (see Kohler and Bhorat, 2023 for a detailed explanation of the imputation method used). Imputations are not generated for those who reported exact wage values. Table 14 in the appendix describes the wage data on the sample size, extent of missing data, and number of imputations for both bracket and exact value responses between 2011 and 2023 for the employed. On average, 17.4 per cent of workers do not report the bracket response, while 45.6 per cent do not report exact wage data over the reported period. The last column shows that we successfully imputed, on average, 97.6 per cent of missing brackets, exact wage data, and/or outliers.

Next, we adjust grant values to account for the bi-annual government changes (April and October adjustments). That is, for any given year, we allocate monthly grant values based on the announced value, considering the changes from April and October each year. We then average across the year to obtain a monthly average grant value. We use the remittances and pension values as given in the GHS data.

Lastly, we construct our household income variable by summing the imputed wage variable, adjusted grant values, pensions, and remittances. To account for inflation, values from each survey are rebased to December 2023 prices.

- 1. The headcount ratio (P0) measures the proportion of the population whose income (or expenditure) is below a specified poverty line (Makoka and Kaplan, 2005). Of the three measures, this is the easiest to understand. However, it does not account for how far the poor are below the poverty line or the distribution of income among the poor. The headcount ratio is also known as the poverty rate.
- 2. The poverty gap index (P1) measures the difference between the mean income of the poor and the poverty line, expressed as a percentage of the poverty line. The poverty gap index has two distinct advantages over the headcount ratio: firstly, it allows for an understanding of the depth of poverty, and secondly, it indicates the minimum cost of eliminating poverty (Makoka and Kaplan, 2005).
- 3. The squared poverty gap index (P2) is similar to the poverty gap measure, but it squares the gaps between the mean income (or expenditure) of the poor and the poverty line, giving more weight to those furthest from the line. A key advantage of this measure is that it provides insights into distributional changes of income (or expenditure) among the poor (Makoka and Kaplan, 2005). However, a limitation is that it is difficult to interpret and is therefore not as widely used as the other two measures.

Having considered these three indices, we now turn our attention to the trends they reveal in South Africa. Our analysis considers four groups: the national population, the employed<sup>1</sup>, all households, and households with at least one child under 18 years. For the first two groups, poverty is measured at the individual level, while for the latter two, it is measured at the household level. The determination of whether an individual or household is poor is based on whether the household income per capita falls below the upper-bound poverty line provided by Statistics South Africa for that year.

Table 1 presents estimates of the headcount ratio (poverty rate) across each group between 2011 and 2023. In 2011, using the upper-bound poverty line, 51.6 per cent of the population were poor. This proportion dropped to 46.6 per cent in 2015 and to 44.9 per cent in 2019 before rising again to 48.8 per cent in 2023. Between 2011 and 2023, the overall change was a decrease of 5.4 per cent. While the 2011 estimate is similar to the official poverty estimate of 52.3 per cent, the 2015 estimate is 8.9 percentage points lower than the official estimate of 55.5 per cent in 2015 (Statistics South Africa, 2017a). The official estimates for 2011 and 2015 were based on the 2010/11 Income and Expenditure Survey and the 2014/15 Living Conditions Survey (Statistics South Africa, 2017a), both designed to measure poverty and inequality based on detailed expenditure and income modules. In contrast, the primary focus of the GHS is measuring service delivery. While the GHS-based estimates here suggest a slight decline in the poverty rate between 2011 and 2023, it is important to recognise that these are based on data containing a significant proportion of imputations.

TABLE 1. Poverty headcount ratio (P0) in South Africa, 2011-2023

	2011	2015	2019	2023	Per cent change (2011-2023)
Upper-bound poverty line	R799	R992	R1,227	R1,558	
All (Individual)	51.6	46.6	44.9	48.8	-5.4
	(0.00)	(0.00)	(0.00)	(0.01)	
Employed individuals	22.6	19.2	18.0	21.2	-6.2
	(0.00)	(0.00)	(0.01)	(0.00)	
All (Households)	41.5	36.7	36.9	39.5	-4.8
	(0.00)	(0.00)	(0.00)	(0.00)	
Households with children	54.8	50.2	49.1	52.6	-4.0
	(0.01)	(0.00)	(0.00)	(0.01)	

Source: GHS 2011, 2015, 2019, 2023, own calculations.

Notes: Standard errors are in brackets. A full set of estimates for both individuals and households using the food, lower-bound and upper-bound poverty lines is presented in Table 15 in the appendix.





Poverty rates amongst the employed are considerably lower than for the general population. This is to be expected as jobs provide wages, which allow employed individuals and their households to escape poverty. Similar to the broader population, the poverty rates amongst workers have declined over the period, from 22.6 per cent in 2011 to 21.2 per cent in 2023, a reduction of 6.2 per cent or 1.4 percentage points.

Amongst households, it is estimated that 41.5 per cent were poor in 2011. While this proportion fell to 36.7 per cent in 2015, it had risen to 39.5 per cent by 2023. The GHS data therefore suggests a slight decline in poverty rates at the household level over the 12-year period. Households with children were, however, consistently more likely than households without children to be poor in each of the years. The majority (54.8 per cent) of households with children were poor in 2011 and, although this proportion dipped below 50 per cent in 2015, by 2023 it was just 2.2 percentage points lower than in 2011. The rate of poverty reduction (4.0 per cent) was the slowest amongst the four groups considered. Higher poverty rates amongst households with children may be due to a combination of factors including the impact of childbearing and -rearing on women's economic participation, relatively few employed adult male household members in households with children, and the direct effect of children adding to the size but not to the income of the household, thus lowering per capita income.

Table 2 presents the poverty gap index for the same four groups. In 2011, the poverty gap for the entire population was 28.4 per cent, which means that the poor, on average, have an income shortfall of 28.4 per cent of the poverty line. Put differently, on average a minimum of R226.92 (based on a poverty line of R799 per month in 2011 prices) would have been required per poor person to eliminate poverty (poverty gap multiplied by the poverty line =  $0.284 \times R799 = R226.92$ ) in 2011. By 2023, the poverty gap is estimated to have fallen to 24.8 per cent, a decrease of 3.6 percentage points over the period, indicating a slight decline in the depth of poverty in South Africa over the period.

TABLE 2. Poverty gap index (P1) in South Africa, 2011-2023

	2011	2015	2019	2023	Per cent change (2011-2023)
Upper-bound poverty line	R799	R992	R1,227	R1,558	
All (Individual)	28.4	24.4	23.1	24.8	-12.7
	(0.00)	(0.00)	(0.00)	(0.00)	
Employed individuals	10.0	8.1	7.4	8.5	-15.0
	(0.00)	(0.00)	(0.00)	(0.00)	
All (Households)	22.9	19.7	19.4	20.9	-9.6
	(0.00)	(0.00)	(0.00)	(0.00)	
Households with children	29.1	25.5	24.9	26.7	-8.3
	(0.00)	(0.00)	(0.00)	(0.00)	

Source: GHS 2011, 2015, 2019, 2023, own calculations.

Notes: Data are weighted. Standard errors are in brackets.

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TABLE 3. Squared poverty gap (P2) in South Africa, 2011-2023

	2011	2015	2019	2023	Per cent change (2011-2023)
Upper-bound poverty line	R799	R992	R1 227	R1 558	
All (Individual)	18.7	15.9	14.9	15.7	-16.0
	(0.00)	(0.00)	(0.00)	(0.00)	
Employed individuals	5.9	4.7	4.3	4.8	-18.6
	(0.00)	(0.00)	(0.00)	(0.00)	
All (Households)	15.7	13.4	13.3	14.2	-9.6
	(0.00)	(0.00)	(0.00)	(0.00)	
Households with children	18.8	16.2	16.00	16.9	-10.1
	(0.00)	(0.00)	(0.00)	(0.00)	

Source: GHS 2011, 2015, 2019, 2023, own calculations.

Notes: Data are weighted. Standard errors are in brackets.

Overall, this analysis yields several key messages. Firstly, being employed significantly reduces the probability of being in poverty, as work provides a stable source of income that is typically sufficient to lift households above the upper-bound poverty line. Furthermore, the importance of obtaining employment to escape poverty has increased over the 2011-2023 period, as evidenced by the employed experiencing the fastest rate of reduction across all three poverty measures. Secondly, while the national population experienced a decrease in poverty, this occurred during a period when South Africa's official unemployment rate increased from an average of 24.8 per cent over the four quarters of 2011 to an average of 32.4 per cent in 2023 (own calculations, Statistics South Africa, 2024d). This reduction in poverty can be partially explained by the expansion of social grants in South Africa, as highlighted by Köhler and Bhorat (2020), who find that a range of grants substantially increases the incomes of the poor. Finally, households with children experience the highest level of poverty, suggesting a need for greater support to these households to address deprivation.

#### 2.2.3. WORKING POVERTY IN SOUTH AFRICA SINCE 2011

One of the aims of this research is to understand the experience of the working poor. The concept of working poverty is particularly salient in the South African context, given high unemployment and the general importance of labour market earnings for avoiding poverty. Unfortunately, there is no universally accepted way to define the 'working poor'.

The European Union defines the working poor as "individuals who are classified as employed (i.e. being in work for over half of the year) and who are at risk of poverty, i.e. live with an equivalised disposable income below 60 per cent of the national median equivalised disposable income" (European Commission, 2014: 482). In contrast, the US Bureau of Labor Statistics (2023) defines the working poor as those who live below the official poverty line and spent at least 27 weeks in the labour market (either working or looking for work) in the past year. Finn (2015) argues that because the South African median wage is far below the mean wage, it makes sense to adopt an absolute measure (such as that of the US Bureau of Labor Statistics), a recommendation followed here.

Vermaak (2010) analyses the Labour Force Surveys in 2000 and 2006 and uses imputed earnings to estimate the number of working poor across the period, using R150 and R500 (in 2000 prices) as the poverty lines. For the former poverty line, the percentage of the employed in poverty fell from 5.6 per cent to 3.3 per cent. For the latter poverty line, 25.3 per cent of the employed were poor in 2000, which was reduced by 7.6 percentage points to 17.7 per cent in 2006.

Finn (2015) provides a working poverty line estimate of R4 125 per month (2015 prices). To arrive at this figure, he identifies earners who worked at least 35 hours a week and reside in a poor household, defined as a per capita income of R1 319 per month (2015 prices). He calculates a household poverty gap – the difference between an individual's earnings and the official poverty line – and the average poverty gap per earner in the household, which provides an indication of the depth of poverty experienced by households. The mean wages of each earner are calculated and added to the average poverty gap per earner of each household. He finds that the majority of employed Africans and Coloureds earn below the threshold, while this is true for only 37.0 per cent of Indians/Asians and 22.4 per cent of Whites. In addition, 58.0 per cent of employed females earn below R4 125 per month, while this is true for 50.6 per cent of males.

Rogan and Reynolds (2015) examine the trends in the working poor between 1997 and 2012. They find that while the proportion of working poor declined over the period, it remains high. In 2012, 13.8 per cent of working poor households lived below the lower-bound poverty line of R219 per capita per month (2000 prices), while the corresponding figure for the upper-bound poverty line (R323 per capita per month in 2000 prices) was 21.4 per cent. An additional line – set at R593 per capita per month (2000 prices) and representing the minimum amount of money required to cover the basic needs of households – indicated that 36.3 per cent of working poor households fell below that line.

Lilenstein et al. (2016), using data from Wave 3 of the National Income Dynamics Study and an inflation-adjusted poverty line of R659 per capita per month, found that 17.0 per cent of employed workers and 19.0 per cent of 'working households' – defined as households where at least one member was working – were experiencing poverty. Their work is extended by Feder and Yu (2020), who undertake a longitudinal analysis of all four waves of the NIDS. Using an upper-bound threshold poverty line of R1 071 per capita per month (December 2016 prices), derived from an official poverty line as determined by Statistics South Africa, they find that the proportion of households experiencing working poverty decreased in each subsequent wave. In wave 1, this figure was 35.3 per cent, decreasing to 31.7 per cent in wave 2 and subsequently to 28.0 and 25.8 per cent in waves 3 and 4, respectively.

In assessing trends in working poverty between 2011 and 2023, the definition used by Feder and Yu (2020)—defining the working poor as employed individuals who are members of poor households (i.e., households where per capita income is below the poverty line)—is employed here, with poverty defined using the upper-bound poverty line. Table 4 compares the demographic characteristics of the working poor with those of the unemployed<sup>2</sup> poor between 2011 and 2023.



Both the working poor and the unemployed poor are evenly split between males and females over the period. Females accounted for between 48.3 per cent and 51.3 per cent of the unemployed poor and working poor in 2011, 2015, and 2019. However, there appears to have been a gradual rise in the female share of the unemployed poor over the period, reaching 53.6 per cent in 2023. In contrast, 48.9 per cent of the working poor were female in 2023, a difference of almost five percentage points compared to their share of the unemployed poor.

 TABLE 4. Characteristics of the working poor and unemployed poor, 2011-2023

	2011		20	)15	20	19	2023	
	Unemp. Poor	Working Poor	Unemp. Poor	Working Poor	Unemp. Poor	Working Poor	Unemp. Poor	Working Poor
Poverty Line	R7	799	R992		R1	R1 227		558
	Gender							
Male	50.1	51.7	50.0	48.8	48.7	50.8	46.4	51.1
Female	49.9	48.3	50.0	51.2	51.3	49.2	53.6	48.9
				Race				
African	91.1	90.0	93.5	87.5	93.5	91.8	94.3	90.6
Coloured	7.9	7.5	5.3	6.8	5.7	4.9	5.1	5.8
Asian	0.6	0.4	0.7	0.6	0.4	0.6	0.4	1.5
White	0.5	2.2	0.6	5.1	0.4	2.6	0.3	2.1
			Ag	ge Cohort				
15-24 years	31.8	10.5	28.9	9.6	23.0	7.3	22.5	7.8
25-34 years	39.5	31.0	41.9	31.7	41.1	29.7	37.3	28.9
35-44 years	17.9	26.8	18.2	26.3	22.5	30.3	24.7	32.5
45-54 years	8.6	20.4	9.1	20.0	10.2	20.4	12.2	19.4
55-64 years	1.9	8.3	1.8	8.4	3.1	8.7	3.1	8.1
65+ years	0.2	3.0	0.2	4.0	0.2	3.6	0.2	3.4
			Ed	ducation				
Primary or less	15.1	31.9	16.9	27.3	12.9	21.5	10.4	17.0
Inc. secondary	44.6	43.8	49.6	44.7	50.0	42.7	46.8	44.2
Comp. secondary	34.3	18.6	28.7	18.2	30.8	24.3	36.2	27.2
Certificate/ Diploma	4.5	2.1	3.2	2.2	4.3	4.1	4.3	3.3
Degree	0.8	0.6	0.7	5.9	1.0	1.6	1.0	1.5
			A	rea Type				
Urban	62.7	55.5	60.0	59.1	56.8	54.5	54.2	57.1
Rural	37.3	44.5	40.0	40.9	43.2	45.5	45.9	42.9
			Р	rovince				
Western Cape	9.8	9.6	7.0	9.3	6.1	6.1	6.2	7.3
Eastern Cape	12.6	14.9	13.1	15.1	11.5	12.4	10.8	12.5
Northern Cape	2.9	2.5	2.0	2.0	2.1	2.0	1.9	2.3
Free State	8.6	6.9	6.3	6.0	6.2	6.7	6.3	6.3

	2011		2015		2019		2023	
	Unemp. Poor	Working Poor	Unemp. Poor	Working Poor	Unemp. Poor	Working Poor	Unemp. Poor	Working Poor
KwaZulu-Natal	17.0	18.5	26.1	20.6	21.2	19.9	23.2	20.4
North West	8.6	8.0	6.6	6.5	6.7	8.9	6.3	6.6
Gauteng	24.2	19.0	22.8	19.9	25.4	20.0	24.6	23.8
Mpumalanga	8.9	8.9	8.8	9.0	12.7	11.4	11.2	10.8
Limpopo	7.5	11.7	7.3	11.6	8.1	12.6	9.5	10.2

Source: GHS 2011, 2015, 2019, 2023, own calculations.

Notes: Figures may not total to 100 due to omission of unspecified and other categories, and rounding.

Africans comprised the overwhelming majority of the unemployed poor and working poor across all years. However, the shares recorded for Africans are higher than their 81.4 per cent share of the population in 2022 (Statistics South Africa, 2022). Roughly nine out of ten working poor individuals were African in 2023, a proportion that is virtually unchanged from 2011. Coloured individuals saw their share of both working and unemployed poor decline slightly over the period. By 2023, only 5.8 per cent of the working poor were Coloured, compared to 7.5 per cent in 2011. While Whites comprised 7.3 per cent of the South African population in 2022 (Statistics South Africa, 2022), they account for just 2.1 per cent of the working poor in 2023, virtually unchanged from 2011. This evidence suggests that, despite the end of apartheid in 1994, the numerous advantages accrued to Whites under the system continue to play a role in understanding poverty dynamics in South Africa.

Young economically active people are consistently more likely to be classified as unemployed poor than as working poor over the 2011-2023 period, reflecting the difficulty of finding employment and persistently high youth unemployment rates in South Africa (Dhliyawo, 2023). In 2023, 7.8 per cent of the working poor were aged 15-24 years, compared to 10.5 per cent in 2011 and 22.5 per cent of the unemployed poor in 2023. Although the difference in shares between the unemployed and working poor for those aged 25-34 years is smaller than for the 15-24 cohort, it is still significant. This older youth cohort accounted for a share of the unemployed poor that is 8.4 to 11.4 percentage points higher than that of the working poor. Individuals aged 35-54 years account for 46.3 per cent to 51.9 per cent of the working poor. While this cohort might be expected to have more experience—and therefore a higher likelihood of employment—than younger cohorts, this large share reflects the absolute number of individuals employed in these two cohorts (ranging from 8.9 million to 11.5 million, compared to a range of 5.6 million to 7.1 million for the other cohorts).

Individuals with primary or less education comprise a substantially larger proportion of the working poor than the unemployed poor, although the difference narrowed from 16.8 percentage points in 2011 to 6.6 percentage points in 2023 (when this group accounted for 17.0 per cent of the working poor, compared to 10.4 per cent of the unemployed poor). On the surface, this appears counter-intuitive, given the established empirical relationship between educational attainment and obtaining a job in South Africa, where those with less education find it more challenging to secure employment than those with higher levels of educational attainment (Statistics South Africa, 2020). However, these shares may reflect age: the working poor are slightly older than the unemployed poor, while younger cohorts have benefited from the expansion of access to schooling, resulting in higher levels of education for these cohorts (Statistics South Africa, 2020). This can be seen in both the unemployed poor and working poor groups, with the share of individuals with primary or less education decreasing substantially as older, less-educated individuals age out of the labour force.

Individuals with incomplete secondary education comprise a plurality of the working poor: at 44.2 per cent of the working poor in 2023, this proportion has not changed significantly between 2011 and 2023. This group's share among the unemployed poor was 44.6 per cent in 2011, increasing to 46.8

per cent by 2023. However, the largest increase among the working poor is for those with a completed secondary education: in 2011, 18.6 per cent of the working poor had a complete secondary education, but this increased to 27.2 per cent by 2023. The growing share of working poverty accounted for by those with a completed secondary education demonstrates that merely increasing access to education is not a sufficient condition to escape poverty. In effect, the value of a completed secondary education in terms of labour market outcomes has decreased over time as more people have been able to obtain that qualification. At the same time, minimum educational requirements sought by employers have increased, with many white-collar jobs requiring a post-secondary qualification. As such, many individuals with a completed secondary education may no longer be eligible for jobs that they would previously have been able to access.

Except for 2023, urban areas accounted for a larger share of the unemployed poor than the working poor. This was driven not by an increase in the proportion of the working poor living in urban areas (which has remained roughly constant over the period), but by a substantial reduction in the share of the unemployed poor residing in urban areas from 62.7 per cent in 2011 to 54.2 per cent in 2023. Despite the lower proportion, the number of unemployed poor residing in urban areas increased from 1.9 million to 3.5 million over the period. However, rural areas experienced faster growth, with the number of unemployed poor increasing from 1.1 million in 2011 to 2.9 million in 2023.

In most provinces, there are only small differences between their shares of the unemployed poor and the working poor. The differences are most apparent in South Africa's two most populous provinces: Gauteng and KwaZulu-Natal. Gauteng accounts for a larger share of the unemployed poor than the working poor, with this difference ranging from 0.8 percentage points (in 2023) to 5.4 percentage points (in 2019). A possible explanation for the difference is that many people who are actively looking for work are attracted to the province due to perceptions of greater job availability; however, once they secure jobs, they are less likely to be poor since wages are relatively high. Except for 2011, the opposite is true in KwaZulu-Natal, where the province accounts for a larger share of the working poor than of the unemployed poor. This may be due to relatively fewer economic opportunities in the province compared to other major provinces (especially Gauteng), or relatively lower wages and/or larger households in KwaZulu-Natal, implying that a higher proportion of the employed experience poverty.

#### 2.2.4. HOUSEHOLDS WITH AND WITHOUT CHILDREN IN SOUTH AFRICA SINCE 2011

Table 5 compares the characteristics of heads of poor households with and without children under the age of 18.

While childless poor households are predominantly male-headed, with their share exceeding 63.0 per cent each year, a similar proportion of poor households with children are female-headed. In the United States, Sharma (2023) finds that the poverty rate for female-headed households with children was 36.5 per cent, more than double the 16.5 per cent rate for male-headed households with children. In South Africa, Rogan (2010) shows that female-headed households face a greater risk of poverty when they have a higher proportion of children. Although the presence of children has a similar effect on male-headed households, the impact is significantly larger in female-headed households.

TABLE 5. Characteristics of household heads for households with and without children, 2011-2023

	20	2011		2015		2019		2023	
	With children	Without children	With children	Without children	With children	Without children	With children	Without children	
Poverty Line	R7	'99	R992 R1 227		227	R1 558			
			Ger	nder					
Male	39.6	65.6	36.6	63.1	35.9	67.1	36.8	68.3	
Female	60.4	34.4	63.4	36.9	64.1	32.9	63.2	31.7	
			Ra	ace					
African	93.2	85.9	92.7	83.7	95.0	90.0	93.8	91.0	
Coloured	6.1	4.0	5.8	3.6	4.2	3.8	5.5	3.7	
Asian	0.3	1.1	0.3	1.7	0.3	0.8	0.3	1.1	
White	0.3	9.0	1.2	11.0	0.5	5.4	0.4	4.1	
			Age C	Cohort					
15-24 years	6.4	13.9	4.9	13.7	4.0	12.5	3.8	11.5	
25-34 years	17.8	22.8	19.0	20.6	19.0	23.0	16.8	23.7	
35-44 years	21.3	14.5	22.3	15.0	24.5	19.7	26.3	20.7	
45-54 years	22.8	18.0	22.2	16.6	21.0	16.9	21.1	18.3	
55-64 years	16.8	14.2	16.2	15.0	16.8	13.7	16.1	12.3	
65+ years	14.8	16.5	15.5	19.0	14.8	14.1	15.9	13.5	
			Educ	ation					
Primary or less	49.5	35.1	43.7	32.5	35.4	28.3	29.8	22.0	
Inc. secondary	37.6	39.6	40.8	39.7	41.2	41.8	44.7	43.3	
Comp. secondary	9.9	16.4	10.6	16.0	16.3	19.9	18.7	24.6	
Certificate/Diploma	1.2	4.0	1.5	3.2	2.3	5.5	2.1	4.0	
Degree	0.2	2.0	1.7	6.8	0.9	2.3	1.0	2.3	
			Area	Туре					
Urban	44.6	61.8	46.8	63.6	47.2	62.0	51.2	62.5	
Rural	55.4	38.2	53.2	36.4	52.8	38.0	48.8	37.5	
			Prov	vince					
Western Cape	7.1	8.4	6.0	8.9	4.7	6.9	6.7	7.2	
Eastern Cape	15.8	15.9	16.5	14.0	13.9	11.6	12.7	11.6	
Northern Cape	2.6	2.0	2.4	1.7	2.1	1.7	2.4	1.6	
Free State	6.7	6.3	6.9	5.6	7.1	5.8	7.0	6.1	
KwaZulu-Natal	20.6	14.4	21.1	17.1	20.2	18.5	19.1	16.0	

	2011		20	2015		2019		2023	
	With children	Without children	With children	Without children	With children	Without children	With children	Without children	
North West	7.7	8.3	7.0	8.6	8.7	10.3	8.2	8.8	
Gauteng	14.4	26.6	15.6	27.0	17.4	26.7	20.2	29.5	
Mpumalanga	8.7	6.9	9.5	6.7	10.3	8.5	10.5	9.0	
Limpopo	16.4	11.2	15.0	10.2	15.5	10.0	13.2	10.4	

Source: GHS 2011, 2015, 2019, 2023, own calculations.

Notes: Figures may not total to 100 due to omission of unspecified and other categories, and rounding.

Among poor childless households, the proportion headed by Africans increased from 85.9 per cent in 2011 to 91.0 per cent in 2023, an increase of 5.1 percentage points. In contrast, the proportion of White-headed poor households decreased from 9.0 per cent in 2011 to 4.1 per cent in 2023. The racial composition of household heads with children has largely remained unchanged over the period. However, African-headed households comprise a significantly larger share of poor households with children than poor childless households, while the opposite is true for households with White household heads.

Poor childless households are, on average, headed by younger individuals than those with children. Households headed by youth aged 15-34 years comprise over 35.0 per cent of poor childless households across all periods, while this age group does not exceed 25.0 per cent combined among poor households with children. In contrast, poor households with children are most often headed by individuals aged 35-54 years, accounting for 47.4 per cent of such households in 2023, up slightly from 44.1 per cent in 2011. This increase over time has been driven by households headed by 35-44 year olds, whose share of poor households with children rose from 21.3 per cent in 2011 to 26.3 per cent in 2023.

In line with this difference in the age of household heads across these two types of households, poor households with children tend to have heads with lower levels of education than those without children. Across all years, the proportion of households with children headed by individuals who attained primary or less education was substantially higher (by between 7.1 and 14.4 percentage points) than for poor households without children. In 2023, 74.5 per cent of poor households with children were headed by individuals with less than complete secondary education, compared to 65.3 per cent of poor childless households. Conversely, 30.9 per cent of poor childless households had heads with complete secondary or post-secondary education, compared to 21.8 per cent of poor households with children. Over the period, educational attainment among heads of both types of households improved, with significant declines in the proportions with primary or less education, slight increases in the proportions with incomplete secondary education, and significant increases (approaching 10 percentage points) in the proportions with complete secondary education.

A marginally smaller proportion of households without children have heads who have completed secondary education compared to those with children. The difference ranges from 3.6 percentage points in 2019 to 6.5 percentage points in 2023. This aligns with statistics from the Department of Basic Education (2024), which show that the number of National Senior Certificate passes has increased by 2.5 per year between 1994 and 2023, implying that more young people (who comprise a plurality of heads of poor households without children) are completing their secondary education. Heads of poor households without children are also more likely to have obtained a post-secondary qualification, such as a certificate/diploma or degree, than their counterparts in households with children, although the differences are far smaller than for complete secondary education.

There is a stark contrast between where households without and with children reside. The majority of those without children live in urban areas (more than 60.0 per cent across all years), and this has not substantially changed between 2011 and 2023. For poor households with children, there is a more even division between urban and rural areas, with rural areas typically accounting for the larger share.

However, the trend over time has been towards a larger share of poor households with children located in urban areas, rising from 44.6 per cent in 2011 to 51.2 per cent in 2023. A likely explanation for this is related to the age profile of the households, with younger cohorts being drawn to urban areas for jobs and public services, while older cohorts may have other considerations, such as caring for elderly family members, which may require them to leave urban areas. At the same time, South Africa is urbanising with each passing year. Between 2011 and 2023, the proportion of the population living in urban areas is estimated to have increased from 62.3 per cent to 69.8 per cent by 2023 (UN, 2018).

Three provinces – KwaZulu-Natal, Gauteng, and Limpopo – have substantially different shares of poor households with and without children. In 2011, 20.6 per cent of households with children were resident in KwaZulu-Natal, compared to only 14.4 per cent of poor childless households, a difference of 6.2 percentage points. Although this gap was reduced to 3.1 percentage points by 2023, it remains one of the largest differences between provinces. A similar pattern emerges in Limpopo. In contrast, there is a much larger proportion of childless poor households in Gauteng compared to those with children, with the difference ranging from 9.3 percentage points to 11.8 percentage points. In 2023, only two provinces, in addition to Gauteng, had a larger share of childless poor households than poor households with children: the Western Cape (7.2 per cent of poor childless households, compared to 6.7 per cent of poor households with children) and North West (8.8 per cent and 8.2 per cent respectively). This pattern may be linked to migration patterns – and labour migration in particular – with all three provinces experiencing significant net in-migration. Between 2016 and 2021, these three provinces had the largest net in-migration flows among South Africa's provinces: +865,000 for Gauteng, +317,000 for the Western Cape, and +113,000 for North West (Statistics South Africa, 2024b).

# 2.3. Inequality in South Africa

South Africa has long been characterised by extreme inequality, with the World Bank (2022) ranking it as the most unequal country in the world, exhibiting a consumption per capita Gini coefficient of 0.67 (where a value of zero indicates perfect equality and a value of one indicates perfect inequality). This high level of inequality is further highlighted by comparing South Africa's income shares of the top 10 per cent and bottom 50 per cent of the population in 2022 with those of other countries (Figure 2).

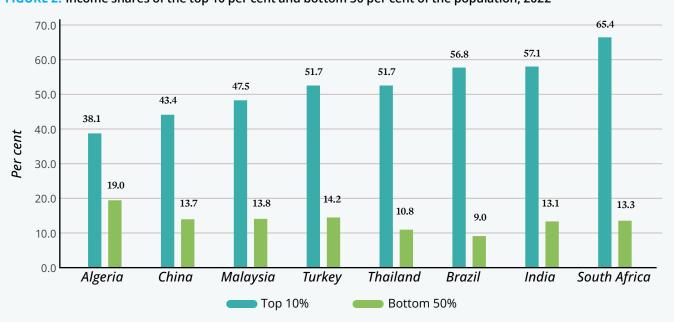


FIGURE 2. Income shares of the top 10 per cent and bottom 50 per cent of the population, 2022

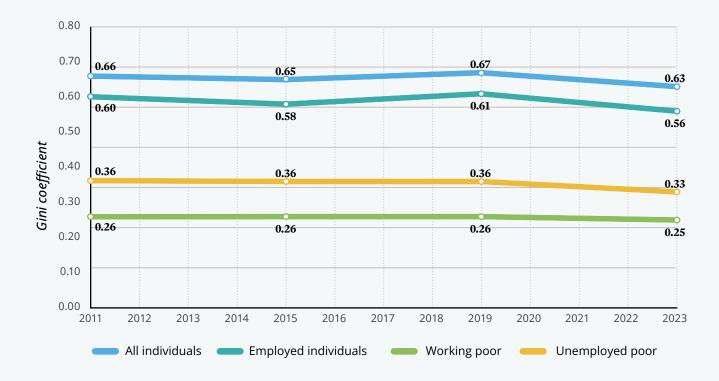
Source: Alvaredo et al. (2022).

In South Africa, the top 10 per cent of the population receive 65.4 per cent of income, the highest proportion among all countries in the database. In contrast, the top 10 per cent in Brazil and India receive around 57 per cent of total income, while the proportion is 43.4 per cent in China and 38.1 per cent in Algeria. At the other end of the distribution, the poorest 50 per cent receive 13.3 per cent of total income—higher than the shares in Brazil (9.0 per cent), Thailand (10.8 per cent), and India (13.1 per cent). On this metric, South Africa performs somewhat better.

Several studies show that inequality worsened in the two decades following 1994. Using the IESs from 1995 and 2000, Seekings et al. (2004) estimate that the Gini coefficient increased from 0.65 to 0.70. Employing data from the PSLSD and NIDS, Leibbrandt et al. (2012) find that the Gini coefficient rose from 0.66 to 0.70 between 1993 and 2008. However, Hundenborn et al. (2018) showed that inequality fell marginally between 1993 and 2014, with the Gini coefficient decreasing from 0.68 to 0.66. Statistics South Africa (2019) also report a decline in inequality as measured by the Gini coefficient, albeit over a different period (2006-2015), from 0.67 to 0.65. Thus, while inequality is estimated to have been high and rising during the initial decade and a half of the post-apartheid period, more recent estimates suggest that it may have stabilised or even declined slightly.

Figure 3 presents estimates of the Gini coefficient for the population as a whole, as well as for the employed, the working poor, and the unemployed poor between 2011 and 2023, using the household nominal income per capita variable employed in the poverty analysis section. Across all four groups, income equality has declined slightly between 2011 and 2023, consistent with the findings of Hundenborn et al. (2018) and Statistics South Africa (2019). The largest relative decline was among the employed, who experienced a decrease in income inequality of 7.1 per cent, compared to a 4.5 per cent decline nationally. The relatively low level of inequality among the working and unemployed poor compared to the other two groups is a result of the way these two groups were defined, which capped the maximum household income per capita at the upper-bound poverty line for that particular year, thereby reducing inequality.

FIGURE 3. Gini coefficient, 2011-2023



Source: Own calculations, GHS 2011, 2015, 2019 and 2023.

Notes: The poor are defined as individuals living in households with per capita incomes below the upper-bound poverty line for that year.

The upper-bound poverty lines are R799 per month in 2011, R992 per month in 2015, R1,227 per month in 2019, and R1,558 in 2023. Estimates are derived using the imputed household income variable, as described in Box 1.

Despite the decline, inequality remains high. Several factors explain South Africa's persistently high level of inequality. Firstly, the legacy of apartheid resulted in the White minority accumulating assets and access to the best labour market opportunities, which were denied to people from other races, particularly the Black majority (World Bank, 2022). Furthermore, the apartheid government forcibly relocated Black people to homelands known as Bantustans or townships (Shifa et al., 2023), which were situated far from urban centres where the most job opportunities are available. As a result, these areas are characterised by high levels of poverty, contrasting sharply with the relatively high standard of living in urban areas (Shifa et al., 2023). Lastly, the post-1994 South African labour market is marked by rising wages for skilled workers but stagnant wages for semi-skilled workers, as demand for highly skilled workers grows relative to that for less skilled workers. Since the majority of South Africans are not in skilled occupations, this further reinforces inequality (World Bank, 2022).

# 2.4. Inflation Trends

The cost environment is one of households' primary concerns, making inflation a crucial factor when examining poverty and inequality. In South Africa, price trends have affected citizens' financial wellbeing, particularly in key spending categories. The Consumer Price Index (CPI) measures aggregate price increases and remains the most important indicator of purchasing power over time. It is derived from a representative basket of goods and services that reflects the average South African household.

Figure 4 presents an overview of the South African inflation environment between 2011 and 2023. Headline CPI increased from 100 to 194.6 during this period, indicating a price rise of 94.6 per cent. This decline in purchasing power means that households would need to almost double their expenditure in 2023 to acquire the same basket of goods and services as they did in 2011. Alternatively, what could be purchased with R1 at the beginning of the study period would require R1.95 at the end of the period.

200 10 180 **Headline CPI** 160 140 120 100 Jan 2011 Jan 2019 Jan 2021 Jan 2023 Jan 2013 Jan 2015 Jan 2017 Jan 2012 Jan 2014 Jan 2016 Jan 2018 Jan 2020 Jan 2022 Headline CPI Inflation rate Inflation target Inflation target Average (upper bound) (lower bound) inflation

FIGURE 4. Headline CPI and the inflation rate, 2011-2023

Source: Own calculations, Statistics South Africa (2024a).

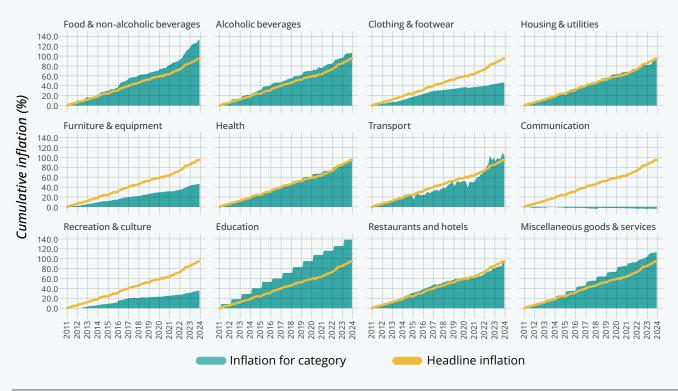
Notes: Headline CPI is rebased from December 2021 to January 2011. The diagram shows the 6 per cent upper and 3 per cent lower bound of the inflation target, and average inflation over the period.

The rise in the CPI directly translates to the erosion of purchasing power. Over the period, the inflation rate averaged 5.2 per cent, marginally below the upper bound of the South African monetary policy inflation target of 6 per cent. The average inflation masks the volatility and variation in monthly inflation rates, as shown by the orange line in Figure 4. It is important to note how inflation fared relative to the inflation target adopted by the South African Reserve Bank (SARB). Only once since 2011 did inflation fall below the lower target, at the onset of the COVID-19 pandemic when much of the world shut down to contain the spread of the virus. This low inflation rate has not been reached since and is unlikely to be achieved soon. In contrast, the upper bound has been breached at least six times, reaching a high of 7.8 per cent in July 2022, a few months after the Russian invasion of Ukraine.

Figure 4 also shows two additional important economic features. The first is the frequency of change in the inflation rate, leaving little room for consistent predictions of future rates. The second is the magnitude of change. Periods such as 2011, 2015, 2019, 2020, and 2022 depict significant changes, further fuelling difficulties in forming accurate expectations.

Figure 5 provides an insightful glance at relative cumulative price changes for the key expenditure categories of the CPI and illustrates the divergent inflationary paths across categories. Overall inflation, represented by the brown dotted line, averaged 94.6 per cent over the period. Any lines ending above the dotted line indicate categories that have become more expensive than those below the overall inflation line. Four categories increased by more than the average inflation rate of 94.6 per cent: Education (+138 per cent), FNAB (+133 per cent), ABT (+106 per cent), and Miscellaneous goods and services (+113 per cent), along with transport (+104 per cent), which experienced the largest price increases. While these rates are higher than the average, not all categories have increased faster than average inflation. Categories such as health (+94 per cent) and housing and utilities (+92 per cent) have also increased at a relatively high rate, but with cumulative rates marginally lower than overall inflation, they are considered relatively cheaper. A final standout is that only one category experienced an overall decline in price level over the period: Communication. The cumulative decrease in the cost of communication between 2011 and 2023 is 4.25 per cent.

FIGURE 5. Cumulative inflation by category, 2011-2023



Source: Own calculations, Statistics South Africa (2024a).

Notes: The figure shows cumulative inflation for the key categories of South African inflation between 2011 and 2023.

A breakdown of the average annual inflation rate by expenditure category is shown in Figure 6 below to unpack the nuances of some of the largest contributors.

WC 7.0 EC LP 4.0 Education 3.0 Food & non-alcoholic beverages 2.0 Transport 1.0 NC MP Health 0.0 Housing & utilities Upper inflation target Clothing & footwear Household contents & services Lower inflation target GP NW **KZN** 

FIGURE 6. Figure 6. Average annual inflation by category and province, 2011-2023

Source: Own calculations, Statistics South Africa (2024a).

Note: Not all categories have been included in the figure. The excluded categories include communication, recreation and culture, restaurants and hotels, and miscellaneous goods and services. Individually, these account for a small proportion of the basket, and overall amount to 31.94 per cent of the basket.

Figure 6 shows the breakdown by category and province. The radar chart compares average annual inflation rates over the period for key categories of the CPI. Although education comprises a small part of the CPI basket at 2.62 per cent, this category experienced the highest average annual inflation rate at 6.9 per cent, exceeding the 6 per cent upper bound of the inflation target. The FNAB inflation rate is close to that of education. This trend suggests that the cost of education and basic sustenance has been rising more rapidly than other categories, potentially placing significant pressure on household budgets nationwide. The inflation rates for these categories frequently exceed the upper inflation target (represented by the dashed grey line), indicating persistent above-target price increases in these crucial sectors.

There is considerable variation in inflation rates across different expenditure categories. While education and food show consistently high rates, categories such as clothing and footwear (yellow line) and household contents and services (brown line) generally exhibit lower inflation rates, often falling below the lower inflation target. This disparity highlights the uneven nature of price increases across different sectors of the economy. Transportation (green line) and housing and utilities (purple line) tend to fall in the middle range, showing moderate inflation rates that are generally within or close to the target band in most provinces. This information should be contextualised. At an annual inflation rate of 7 per cent, nominal education costs double every 10 years.

Provincial differences in inflation rates are also evident from Figure 6. Some provinces, such as the Western Cape (WC) and Gauteng (GT), appear to have slightly higher overall inflation rates across multiple categories than others. In contrast, provinces like the Eastern Cape (EC) and Northern Cape (NC) show relatively lower inflation rates in several categories. This geographic variation suggests that local economic conditions, policies, and market dynamics, among others, play a role in determining inflation rates,

leading to disparities in the cost of living increases across different regions of South Africa. Despite these variations, the overall high education and food inflation pattern remains consistent across all provinces, indicating a nationwide trend in these critical sectors.

# 2.5. Summary

**Poverty rates in 2023 are broadly similar to those in 2011**. The data suggests a small decline in poverty between 2011 and 2023, which is true across all measures of money-metric poverty considered: the headcount ratio, the poverty gap index, and the squared poverty gap index. The employed experienced the largest decline in poverty over the period, followed by the general population, all households, and households with children. However, it is important to recognise that the GHS data is not ideal for accurately measuring money-metric poverty, and the results rest on a reconstructed household income variable.

**The labour market value of a completed secondary education decreased between 2011 and 2023.** The share of the working poor with a complete secondary education increased by 8.6 percentage points. This decline was caused by an increase in the number of individuals obtaining this qualification and employers raising the minimum educational qualifications for entry-level roles.

**Gauteng accounts for a larger share of the unemployed poor than the working poor**. Many job seekers are drawn to Gauteng due to the perceived abundance of job opportunities. However, once they secure employment, they are less likely to fall into the category of the working poor, as wages tend to be relatively high.

**KwaZulu-Natal accounts for a larger share of the working poor than the unemployed poor.** This could be attributed to relatively fewer economic opportunities in the province or relatively lower wages, implying a larger share of the employed experience poverty.

**Poor childless households are, on average, headed by younger individuals than those with children.** Households headed by individuals aged 15-34 years comprise over 35.0 per cent of poor childless households across all periods, while these two groups do not exceed 25.0 per cent combined among poor households with children.

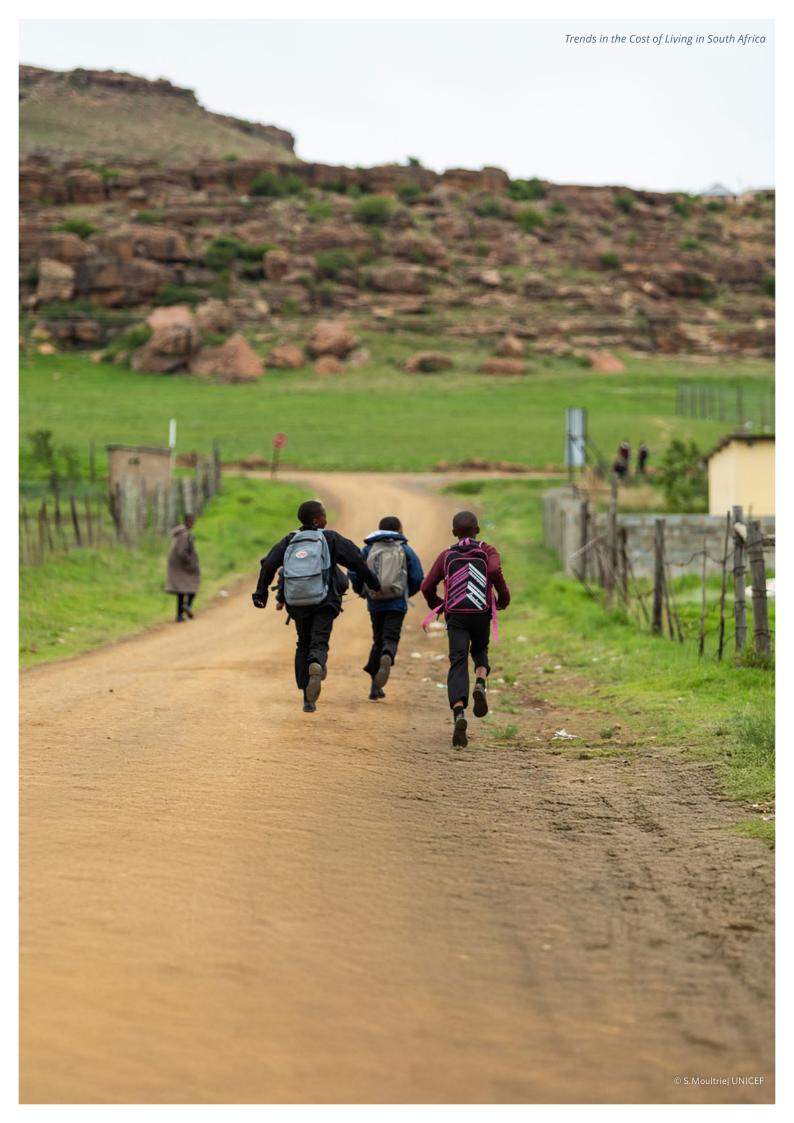
Household heads of poor households with children have lower levels of educational attainment than heads of poor childless households. There is a higher share of primary or lower levels of education and a lower share of completed secondary education among household heads in poor households with children than those without.

There is a noticeable difference in the locations where poor households with children and those without children reside. More than 60.0 per cent of poor households without children reside in urban areas, and this has not substantially changed between 2011 and 2023. For poor households with children, the distribution between urban and rural areas is relatively balanced. However, there is a growing trend of a higher proportion of these households residing in urban areas.

**Although inequality declined slightly between 2011 and 2023, it remains high.** The employed experienced the largest decline in inequality (-7.1 per cent) compared to a 4.5 per cent decline nationally. However, inequality remains high, with the national Gini coefficient estimated at 0.63 in 2023.

**Average inflation was relatively high at 5.2 per cent between 2011 and 2023.** Inflation rates showed significant variation across the period, with a low of 2 per cent in May 2020 and a high of 7.8 per cent in July 2022. Since the last quarter of 2021, average inflation has exceeded the inflation target upper limit.

The cumulative inflation rates of key household expenditure categories—food and non-alcoholic beverages, education, and transport—are significantly above the national cumulative inflation rate. The cumulative inflation rate of 94.6 per cent masks significant variation among key household expenditure categories. Education (+138 per cent) experienced the highest rate, followed closely by food and non-alcoholic beverages (+133 per cent).



# 3. Incomes

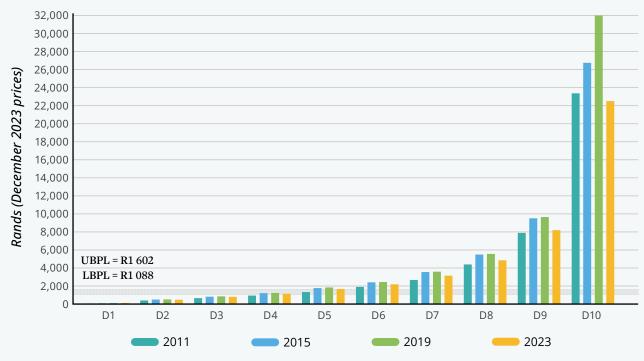
# 3.1. Household Income

## 3.1.1. TRENDS IN HOUSEHOLD INCOME

The analysis of trends in household income focuses on monthly per capita household income, adjusted to December 2023 prices. As described in Box 1, household income is the sum of four income sources: wages and salaries, grants, remittances, and pension income. When shared equally across all household members, this represents monthly per capita household income. Households are the unit of analysis here: income deciles are constructed using monthly per capita household income for each year, with each decile accounting for 10 per cent of all households in that year. Because household size often varies systematically with income, these deciles account for differing shares of the total population, with poorer deciles often representing more than 10 per cent of the total population. Table 16 in the appendix reports each decile's population share and income share for each year between 2011 and 2023. For example, in 2023, the bottom four deciles (40 per cent) of households are home to 49.5 per cent of the population and account for 5.8 per cent of total income. In contrast, the top decile (10 per cent) of households accounts for 48.0 per cent of total income but only 6.9 per cent of the population.

Average per capita income in South Africa decreased from R5,316 in 2011 to R5,270 in 2023, representing a 0.9 per cent decline. Figure 7 illustrates the significant variation around these averages by presenting average household per capita income for each decile in December 2023 prices. Mean per capita household income in decile 4 hovers around the lower-bound poverty line, while mean income in decile 5 is roughly equivalent to the UBPL.

FIGURE 7. Mean household per capita income per month by decile (December 2023 prices), 2011-2023



Source: GHS (2011, 2015, 2019, 2023), Statistics South Africa (2024a).

Notes: Household income refers to imputed household income as described in Box 1. Deciles are household deciles, each representing 10 per cent of all households. Values are expressed in December 2023 prices. The lower-bound poverty line (LBPL) is R1 088 per capita per month in December 2023 prices, while the upper-bound poverty line (UBPL) is R1 602.

Mean per capita household incomes for the bottom four deciles have consistently fallen below the UBPL over this period, while mean per capita household incomes for the bottom three deciles have remained below the lower-bound poverty line. In contrast, the per capita income of the richest 10 per cent of households in 2023 was nearly 16 times the upper-bound poverty line and more than 23 times the lower-bound poverty line, illustrating a high degree of income inequality.

Figure 8 presents trends in mean household per capita income across the distribution from 2011 to 2023 to provide a clearer picture of income trends. The figure shows mean household per capita income as an index where 2011 equals 100; a value below 100 indicates that average household per capita income in a given year is lower than in 2011, whereas a value above 100 indicates that it has risen since 2011. Over the entire period, the poorest quintile saw a 17.7 per cent increase in mean household per capita incomes in real terms, with a similar increase observed for quintile 2. For quintiles 3 and 4, incomes increased by 13.2 per cent and 5.8 per cent in real terms, respectively. However, quintile 5 is estimated to have experienced a slight decline in mean household per capita income of 5.5 per cent, suggesting that the overall decline in mean income between 2011 and 2023 highlighted above was attributable to trends in the top quintile. It is important to note, however, that the income variable used here is unlikely to accurately reflect the wealthiest households that earn significant incomes from sources other than wages, grants, remittances, and pensions; these households' incomes are likely significantly underestimated, and the trends observed may differ considerably from those of a more comprehensive income variable.



FIGURE 8. Change in indices of mean household per capita income by quintile (2011=100), 2011-2023

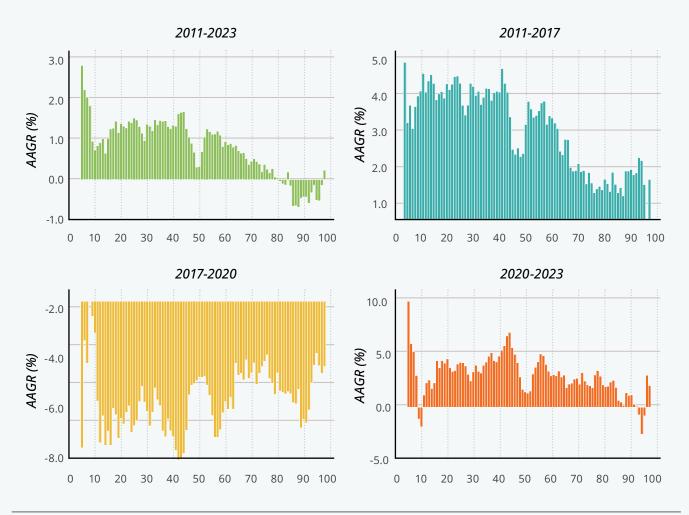
Source: GHS (2011-2023), Statistics South Africa (2024a).

Notes: Household income refers to imputed household income as described in Box 1. Quintiles are household quintiles, each representing 20 per cent of all households. Values expressed as indices with base 2011=100.

Growth incidence curves (GICs) enhance this analysis by illustrating the average annual growth rate of real household per capita income for every percentile of the distribution between two points in time. GICs are typically used to determine whether a growth episode in a country was pro-poor. Figure 9 shows the per capita household income growth rate between 2011 and 2023, and for three subperiods, across the income distribution. Over the entire 2011-2023 period, income growth was concentrated in the bottom half of the distribution, exceeding two per cent per annum for some percentiles. Between the 20th and 50th percentiles, households experienced increases in per capita income of around one per cent per annum.

Above the 50th percentile, income growth rates gradually declined, and after the 85th percentile, turned negative for most percentiles. In short, using this measure of household income, households at the lower end of the distribution experienced income growth, while those at the very top experienced declines.

FIGURE 9. Annual average growth rate of real per capita household income across the distribution, 2011-2023



Source: GHS (2011, 2017, 2020, 2023), Statistics South Africa (2024a).

Notes: Household income refers to imputed household income as described in Box 1. Percentiles are household percentiles, each representing one per cent of all households. Values are deflated to December 2023 prices. Note that each graph has different y-axes.

Splitting the 2011-2023 period into three sub-periods, a different picture emerges. Between 2011 and 2017, income growth was significantly more rapid, although there were strong reversals across the entire distribution from 2017 until 2020. However, the short 2020-2023 period saw stronger growth, with gains particularly for the lower end of the distribution, a phenomenon that may be linked to the rollout of the Covid-19 SRD grant.

Cumulative distribution functions (CDFs) are typically used for poverty analysis and, in particular, exploring the robustness of poverty trends where there are multiple poverty lines. Figure 10 plots a series of CDFs, which show the proportion of households with per capita income no more than a particular value, for four years from 2011 to 2023. Thus, for example, roughly 50 per cent of households in 2011 had per capita household incomes of no more than R2 000 per month, while around roughly 60 per cent of households in 2015 had incomes of no more than roughly R3 500 per month. Where one CDF lies below another, the proportion of households earning up to a given amount is lower, pointing to a rise in incomes for that part of the distribution.

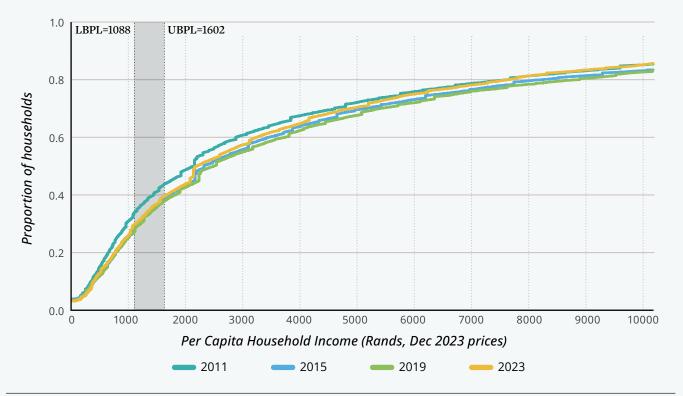


FIGURE 10. Cumulative distribution function of real per capita household income (December 2023 prices), 2011-2023

Source: GHS (2011, 2015, 2019, 2023), Statistics South Africa (2024a).

Notes: Household income refers to imputed household income as described in Box 1. Values are deflated to December 2023 prices. Values above R10 000 per capita per month are not presented.

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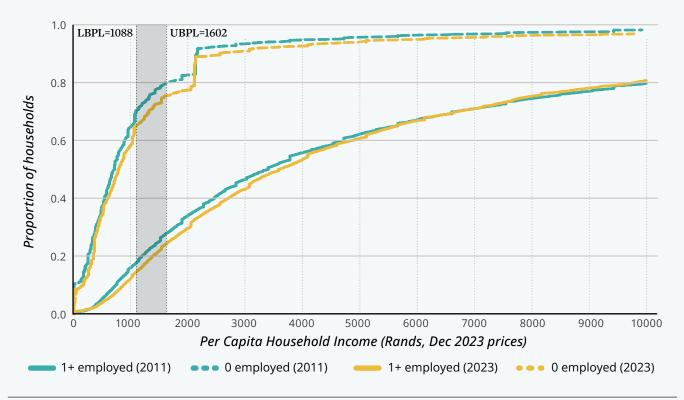
#### 3.1.2. INCOME BY HOUSEHOLD CHARACTERISTICS

Figure 11 compares the CDFs for households with and without employed members in 2011 and 2023. In both years, the CDF for households with no employed members lies below that of households with at least one employed member. The CDFs indicate that poverty declined for both types of households between 2011 and 2023, regardless of the chosen poverty line within a broad range of values up to at least R5,000 per month.

The gaps between the CDFs illustrate significant income disparities between those residing in households with and without access to wage income. The incidence of poverty for households without access to wage income is high compared to those with at least one employed member: in 2023, using the upper-bound

poverty line, the poverty rate for households with access to wage income is 25 per cent, roughly one third of the rate for households without access to wage income. While the poverty rates are slightly higher in 2011 at the upper-bound poverty line, the gap between these two groups of households is similar in size. Households without employed members are more likely to rely on grants and remittances as their primary sources of income, highlighting the importance of social assistance in alleviating poverty.

FIGURE 11. Cumulative distribution functions of real household income per capita (December 2023 prices) by presence of employed household member, 2011 and 2023



Source: GHS (2011, 2023), Statistics South Africa (2024a).

Notes: Household income refers to imputed household income as described in Box 1. Values are deflated to December 2023 prices. Values above R10 000 per capita per month are not presented.

While households without access to wage income are more vulnerable to poverty than those with at least one employed member, the same applies to households with children, which tend to have lower incomes than those without children (World Bank, 2018; Hall et al., 2012). How does the income distribution of households with children compare with that of households without children in South Africa? Figure 12 compares the CDFs for households with and without children in 2011 and 2023. In both years, the CDF for households without children falls below that of households with children, indicating higher incomes for the former group. The gaps between the graphs highlight the significant disparity between households with and without children. For example, approximately 60 per cent of households with children had a per capita income of up to R5,000 per month, compared to 80 per cent of households without children in both years. Conversely, around 20 per cent of households with children had incomes above R5,000 per capita per month, compared to 40 per cent of households without children.

The figure suggests that poverty slightly decreased for both groups over the period, with a more substantial decrease for households with children than for those without. This holds true for all poverty lines between R500 and at least R4,000 per month.

LBPL=1088 UBPL=1602 0.8 Proportion of households 0.6 0.4 0.2 0.0 1000 2000 3000 4000 5000 6000 7000 8000 9000 10000 Children (2011) No children (2011) Children (2023) No children (2023)

FIGURE 12. Cumulative distribution functions of real household income per capita (December 2023 prices) by presence of children, 2011 and 2023

Source: GHS (2011, 2023), Statistics South Africa (2024a).

Notes: Household income refers to imputed household income as described in Box 1. Values are deflated to December 2023 prices. Values above R10 000 per capita per month are not presented.

# 3.2. Income Sources

### 3.2.1. KEY INCOME SOURCES

As the discussion of households with and without employed members illustrates, different types of households derive their incomes from various sources. In the GHS, the following income sources can be identified: salaries/wages; income from a business; remittances; pensions; grants; sales of farm products and services; and other incomes (e.g. rental income, interest). However, as previously noted, only salaries/wages, remittances, pensions, and grants are included in the household income variable considered here. Figure 13 presents each of the four income sources as a share of total household income for each year between 2011 and 2023.

Income from the labour market—salaries and wages—consistently accounts for close to 90 per cent of total household income each year. That said, salaries and wages declined slightly in importance over the period, from 88.5 per cent of household income in 2011 to 86.3 per cent in 2023. From a low of 84.9 per cent in 2020, wages and salaries have been gradually increasing as a share of household income.

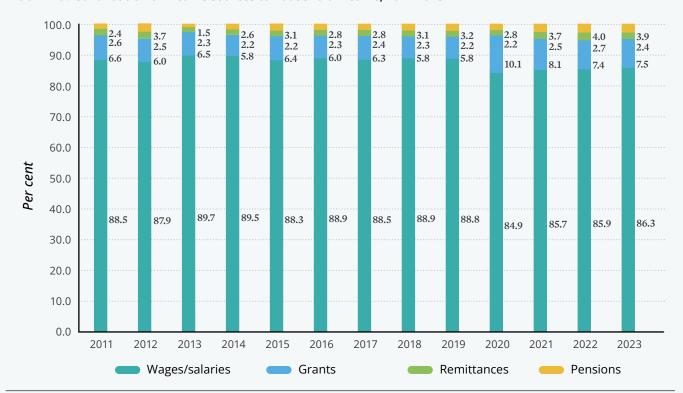


FIGURE 13. Contribution of income sources to household income, 2011-2023

Source: GHS (2011, 2015, 2019, 2023), Statistics South Africa (2024a).

Notes: Household income refers to imputed household income as described in Box 1.

Of the three remaining sources of income, grants contribute the second largest share of total household income. Averaging between 5.8 per cent and 6.6 per cent from 2011 to 2019, the share of income from grants jumped to 10.1 per cent in 2020—the peak of the Covid-19 lockdowns and coinciding with a significant social assistance response to the pandemic. While the share of income from grants declined in 2021 to 8.1 per cent, ending the period at 7.5 per cent of household income, it remains above the average for the nine pre-Covid years since 2011. South Africa's social assistance is relatively high compared to other developing countries, accounting for 3.3 per cent of GDP compared to 1.4 per cent in other developing countries (World Bank, 2021; Bhorat et al., 2023).

Both remittances and private pensions contribute less than three per cent to total income over the period, except for the final three years when the share from pensions rose to around four per cent. In 2011, remittances accounted for 2.6 per cent, slightly more than the share of private pensions (2.4 per cent). By 2023, remittances remained at around 2.4 per cent of household income, while pensions had increased to 3.9 per cent.

South Africa has a relatively comprehensive social assistance programme, which aims to protect the poor through cash or in-kind transfers (Bhorat et al., 2023). Grants are instrumental in supporting households at the lower end of the income distribution that typically lack access to labour income. This is confirmed in Figure 14, which illustrates the contribution of each income source across the income distribution between 2011 and 2023. The data confirms that grants are the main source of income for poor households, while labour income is the primary source for those in the top income deciles. In 2023, grants accounted for 86.0 per cent and wages and salaries for 8.2 per cent of household income in decile 1. In contrast, grants were almost non-existent in decile 10 (0.2 per cent), while income from work accounted for 94.6 per cent of household income<sup>3</sup>. In fact, grants have grown in importance for the poorest deciles over the period. For example, the share of grant income in household income for the bottom decile increased from 75.7 per cent in 2011 to 86.0 per cent in 2023, a trend that may have been reinforced by the introduction of the Covid-SRD grant. In contrast, the contribution of remittances to total income has steadily decreased for the lower deciles over the period. The share of remittances in the income of the bottom decile decreased from 12.9 per cent in 2011 to 5.8 per cent in 2023, a decline of 6.1 percentage points.



FIGURE 14. Contribution of income sources to household income across the distribution, 2011-2023

Source: GHS (2011, 2015, 2019, 2023), Statistics South Africa (2024a).

Notes: Household income refers to imputed household income as described in Box 1.

Relative to other income sources, private pensions contribute the smallest share of income across the income distribution. Additionally, pension income is skewed towards higher-income households and contributes little to nothing to the resources at the lower end of the distribution. The share of income from pensions in the top decile increased from 2.5 per cent in 2011 to 4.6 per cent in 2023. This gap between the poorest and wealthiest deciles highlights the disparities in the ability to save across the income distribution, which is linked to differences in access to employment and income from work.

In summary, the composition of income has remained largely unchanged over the 2011-2023 period. Poor households are heavily—and increasingly—reliant on grants, while households at the top of the income distribution depend on earnings from labour. Since pensions are primarily derived from labour income, low employment rates and limited access to income from work among the poorest households undermine their ability to save, rendering them reliant on the state for income support during old age.

South Africa's social security system does not provide for those outside formal employment, and informal sector workers cannot afford to contribute to pension systems. Consequently, most of these workers retire without any source of income, facing poverty and destitution in old age (ILO, 2022). Retirement policies should target poor households by integrating them into pension systems. For example, the government can provide incentives for poor households to save; subsidise pension contributions for low-wage earners; encourage workers in the informal sector, the self-employed, or atypical workers to save for retirement; or create flexible retirement savings options tailored for irregular income earners. While achieving inclusive retirement reform in South Africa is crucial to ensure that all households have the opportunity to make long-term retirement savings—and, in turn, relieve pressure on the fiscus by reducing government spending on the old age grant—the effectiveness of such reform is constrained by the extent to which the economy creates jobs.

#### 3.2.2. WAGE TRENDS

There is broad consensus in the literature that labour market income is the main contributor to household income inequality(Shifa et al, 2023; Bhorat et al. 2020; Hundenborn et al. 2018; Wittenberg, 2017). Changes in wages are therefore likely to drive changes in wage inequality. Figure 15 presents changes in mean and median real wages of the employed from 2011 to 2023. The gap between mean and median wages provides a sense of income inequality: the closer the mean and median wages are, the lower the inequality.

The GHS data suggest relatively large variation in mean wages over the period, which is at least partly related to challenges in the income data in this survey. Mean real wages increased from around R12,500 in 2011 to R15,700 in 2019, before falling again to R12,100 in 2023. This change between 2011 and 2023 represents an average annual growth rate of -0.3 per cent. Median wages also increased during the first part of the period, rising from around R6,900 in 2011 to a peak of R9,200 in 2018, before declining during the later years to R7,300 in 2023. Between 2011 and 2023, however, the real median wage is estimated to have grown by 0.5 per cent per annum on average.

FIGURE 15. Mean and median real wages (December 2023 prices), 2011-2023



Source: Own calculations, GHS (2011-2023), Statistics South Africa (2024a).

Notes: The wage income variable includes imputations as described in Box 1.

Figure 16 presents the average annual rate of growth of real wages between 2011 and 2023 across the wage distribution. Over the full 2011-2023 period, wage growth was largely confined to the bottom 60 per cent of the wage distribution, with several percentiles registering average annual rates of growth of over two per cent per annum. Apart from a few percentiles around the 80th percentile, real wages above the 60th percentile were either stagnant or slightly declining. Wage growth at the lower end of the distribution may be partly attributable to the implementation of policies such as the national minimum wage, among others.

2011-2017 2011-2023 10 Growth rate (%) Growth rate (%) 3 8 2 6 4 0 0 10 20 30 50 60 90 50 60 Wage Percentile Wage Percentile 2020-2023 2017-2020 10 Growth rate (%) Growth rate (%) 5 0 0 -5 0 10 20 50 60 70 80 90 100 0 10 20 30 40 Wage Percentile Wage Percentile

FIGURE 16. Annual average growth of real wages, 2011-2023

Source: Own calculations, GHS (2011, 2017, 2020, 2023), Statistics South Africa (2024a).

Notes: The wage income variable includes imputations as described in Box 1.

Separating the period into sub-periods, it is clear that real wage growth was essentially confined to the 2011-2017 and 2017-2020 periods. Between 2011 and 2017, real wages increased relatively rapidly across the entire wage distribution, with particularly strong growth at the lower end. Between 2017 and 2020, real wage growth was largely confined to the bottom 60 per cent of the distribution, while real wages in the top 30 per cent were typically falling. However, during the 2020-2023 period, real wages were largely in decline.

In summary, the key results from this descriptive analysis are that the wage growth rate was concentrated at the bottom of the wage distribution between 2011 and 2023. However, low wage earners experienced positive wage growth prior to the pandemic and contraction during the post-pandemic period.

### 3.2.3. SOCIAL GRANTS

South Africa has a relatively comprehensive social security system given its level of economic development (Bhorat et al., 2024). The system consists of two pillars: social assistance, which aims to protect the poor using cash or in-kind transfers; and social insurance, which aims to protect individuals from adverse events (Bhorat et al., 2024). The post-apartheid period has seen a significant expansion in the size of the social assistance system, and the number of social grants provided by the state has increased during the period under review.

The total number of social grants rose from 14.9 million in 2010/11 to 18.8 million in the 2022/23 period, an increase of 26.2 per cent over this time (Table 6). Social assistance consists of seven different cash grants: the old age grant (OAG), the war veterans grant, the disability grant (DG), the foster care grant (FCG), the care dependency grant (CDG), the child support grant (CSG), grant-in-aid (GIA), and the COVID-19 social relief of distress grant. In addition to these grants, social relief of distress is provided to qualifying households, often in the form of in-kind support. Three grants—the CSG, OAG and DG—together account



for more than 96 per cent of all grants (excluding the COVID-19 SRD grant) in terms of grants disbursed (SASSA, 2024). In the 2022/23 financial year, the CSG accounted for the largest share of the total number of grants (13.1 million or 69.8 per cent of all grants). The old age grant accounted for 20.6 per cent of all grants, while the disability grant accounted for a further 5.5 per cent. No other grant accounted for more than two per cent of total grants.

TABLE 6. Number of social grants by type of grant, 2010/11-2022/23

Grant type	2010/11	2014/15	2018/19	2022/23	Shar	e (%)	Change (2010/11- 2022/23)		
	('000s)	('000s)	('000s)	('000s)	2010/11	2022/23	('000s)	(%)	
Old Age	2,679	3,087	3,553	3,887	17.9	20.6	1,208	45.1	
War Veterans	1	0	0	0	0.0	0.0	(1)	-98.4	
Disability	1,201	1,113	1,048	1,035	8.0	5.5	(165)	-13.8	
Grant-in-Aid	58	113	222	329	0.4	1.7	270	462.4	
Care Dependency	112	127	150	157	0.8	0.8	45	39.9	
Foster Child	513	500	386	274	3.4	1.5	(239)	-46.6	
Child Support	10,372	11,703	12,452	13,148	69.4	69.8	2,776	26.8	
Total	14,936	16,643	17,812	18,830	100.0	100.0	3,894	26.1	

Source: SASSA (2024).

Notes: SASSA (2024) did not provide statistics for the Covid-19 grant.

Over time, the composition of social assistance has shifted as different grants expanded or contracted more rapidly than others. The old age grant increased particularly rapidly over the period (an increase of 45.1 per cent), resulting in its share of grants rising by almost three percentage points. The number of child support grants also grew relatively quickly, although its 26.8 per cent increase was only marginally faster than the average for all grants. In contrast, the number of individuals receiving disability grants decreased by 13.8 per cent over the period (a decline of 165,000), resulting in its share of grants falling by 3.5 percentage points.

In terms of grant values, the old age, war veterans, and disability grants are the highest value grants, with recipients of the former two receiving a slightly higher amount once they reach the age of 75 years<sup>4</sup>. Grant values are regularly adjusted to counter the effects of inflation over time. Figure 17 presents the inflation-adjusted values of the major grants from April 2011 to October 2023 (values are expressed in December 2023 prices). Overall, nominal adjustments have generally kept pace with the headline inflation rate for

most grants, with the exception of the foster grant and COVID-19 SRD grants. Real values for the old age, war veterans, and disability grants remained around R2,100 per month from April 2011 to April 2017 and gradually edged higher to around R2,200 before COVID-19. In 2020, the value was increased substantially as a temporary relief response for the COVID-19 pandemic until October 2020. Since then, however, the real value of these grants has gradually declined, returning to the levels seen during the mid-2010s.

The real value of the CSG and grant-in-aid gradually drifted upwards between April 2011 and April 2020, before a temporary boost in response to the COVID-19 pandemic. Following the removal of this boost, the real value of these grants has gradually—and very slightly—eroded. In addition, on 1 June 2022, the government offered extra support for individuals caring for orphaned children to supplement the standard child support grant (Social Development, 2022). This is the child support plus top-up in the figure.

In contrast, the foster care grant and COVID-19 SRD grant saw significant declines in real terms. The real value of the foster grant declined from R1,411 in April 2011 to R1,130 in December 2023, representing a decline of 20.0 per cent. The COVID-19 SRD grant fell by 18.4 per cent from R428 in May 2020 (in December 2023 prices) to the current R350.

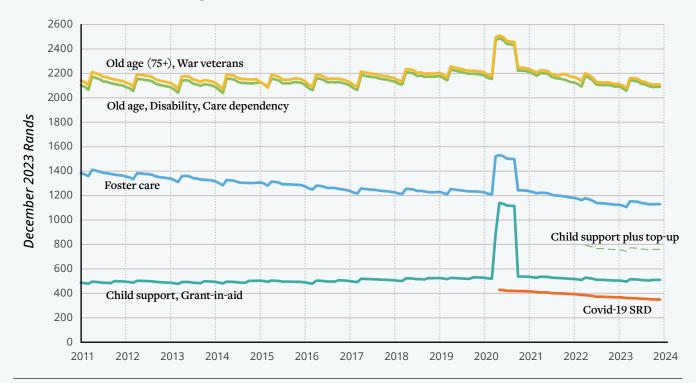


FIGURE 17. Real values of social grants, 2011-2023

Source: Own calculations, SASSA (2011-2023), Department of Social Development (2011-2023), and Statistics South Africa (2024a).

Notes: Values adjusted to December 2023 prices.

It is important to note that using alternative price indices may impact the assessment of whether nominal grant values have kept pace with inflation. The estimates presented here use the official measure of inflation (headline inflation for all urban areas), which shows that prices have increased by 94.6 per cent between January 2011 and December 2023. In contrast, food prices have risen by 136.1 per cent over the same period, while inflation rates for the poorest five expenditure deciles have ranged from 95.7 per cent for decile 5 to 114.1 per cent for decile 1. Expanding the measure to the entire country (i.e., including rural areas), overall inflation over the period was 95.7 per cent, food inflation was 137.6 per cent, and deciles 1 through 5 experienced inflation rates of 112.3 per cent to 97.6 per cent. Using any of these price indices significantly alters the picture presented in Figure 17 (Table 7). For example, using headline CPI, the real value of the old age grant declined by 0.6 per cent between January 2011 and December 2023; however, using the food CPI for urban areas, the decline is 18.0 per cent, while the decline is 9.6 per cent using the decile 1 price index for urban areas.

TABLE 7. Changes in real values of grants using alternative price measures, 2010/11-2022/23

Grant type	No	minal valu	ıes	Jan 2011 val	ues in Dec 2 using:	2023 prices	% Change in Real Terms			
	Jan 2011	Dec 2023	% Change	Headline CPI, Urban	Food CPI, Urban	Decile 1, Urban	Headline CPI, Urban	Food CPI, Urban	Decile 1, Urban	
OAG, DG, CDG	R 1,080	R 2,090	93.5	R 2,102	R 2,550	R 2,313	-0.6	-18.0	-9.6	
OAG (75+), WVG	R 1,100	R 2,110	91.8	R 2,141	R 2,597	R 2,355	-1.5	-18.8	-10.4	
FCG	R 710	R 1,130	59.2	R 1,382	R 1,676	R 1,520	-18.2	-32.6	-25.7	
CSG, GIA	R 250	R 510	104.0	R 487	R 590	R 535	4.8	-13.6	-4.7	

Source: SASSA (2023), Statistics South Africa (2024a).

Notes: Rural price indices are very similar to the urban price indices and therefore the figures presented here are representative of the

magnitude of the impact.

## **BOX 2: Preserving the Purchasing Power of Social Grants**

In simple terms, 'purchasing power' refers to how many goods and services can be bought for a given amount of money. Rising prices mean that, over time, households must spend more to purchase the same basket of goods and services. In other words, the purchasing power of their money is declining. Maintaining the purchasing power (or real value) of social grants over time is essential for the grant system to effectively reduce poverty. To determine the real value of each grant, the (nominal) Rand value at a specific point in time must be adjusted using a price index. Thus, it is possible to express the value of a grant paid today or at any time in the past in, for example, December 2023 Rands.

"...grants are not spent exclusively on food, meaning the food CPI may not reflect the price changes experienced..."

There is a wide range of price indices that can be used to deflate nominal values. Most commonly, the headline CPI for all urban areas is used as a deflator and is the price index generally employed throughout this report. However, the average expenditure basket underlying the headline CPI is not particularly representative of households at the lower end of the income distribution. Oosthuizen (2007) shows that the average basket of goods and services calculated using the standard approach for constructing CPI weights is most representative of households

in the 95th percentile of the income distribution in 2000. This is a common result internationally, where greater inequality is associated with CPIs being more representative of households higher up the income distribution. Statistics South Africa (2024a) also shows that the richest 10 per cent of households account for 48.7 per cent of the weight within the headline CPI, while the poorest 40 per cent account for a combined 6.21 per cent. This means that using the headline CPI for all urban areas to calculate the real value of grants will focus on price movements of goods and services most commonly consumed by wealthy households.

As an alternative to the headline CPI, the food CPI is sometimes suggested to deflate grant values. However, this may have significant disadvantages. First, grants are not spent exclusively on food, meaning the food CPI may not reflect the price changes experienced by grant recipient households. Second, the food CPI is particularly volatile—the standard deviation of the monthly year-on-year inflation rate for the food CPI for all urban areas between January 2009 and August 2024 is almost triple that of the headline CPI—due to price fluctuations driven by seasonal and other factors, such as local and international food supply shocks. Furthermore, while price indices can rise and fall, the food CPI is more likely than an overall CPI to decrease. High volatility in inflation rates may increase pressure for more frequent adjustments to nominal grant values, while falling CPIs would imply that grant values would need to be reduced to maintain their real values.

If the objective is to ensure that grants maintain their purchasing power over time, a suitable price index would accurately reflect the basket of goods and services purchased by households receiving grants. Statistics South Africa publishes price indices for the ten expenditure deciles each month (total country expenditure deciles), calculated based on spending patterns within each decile. The price index for one of the lower deciles—e.g. decile 3—could be used to deflate the values of the grants, or a new index covering the poorest 40 per cent of households could be constructed. This index would be more representative of the spending patterns of households receiving social grants, ensuring that food has an appropriately large weight while also recognising that poor households are exposed to inflation from non-food sources.

The Household Affordability Index, constructed by the Pietermaritzburg Economic Justice and Dignity Group, is another approach to understanding purchasing power for poor households. The index tracks food prices based on a food basket designed in 2020 with low-income women in several areas within Johannesburg, Cape Town, Durban, Pietermaritzburg, Mtubatuba, and Springbok (PEJDG 2024). Food prices are monitored in "47 supermarkets and 32 butcheries that target the low-income market and which women identified as places they shop in the areas where they live" (PEJDG 2024). This approach has limitations in understanding the purchasing power of grants as it is not nationally representative and includes only food items. The authors also note that the food basket is "not nutritionally complete" (PEJDG 2024).

Based on the data collected, the average cost of the Household Food Basket across the monitored areas was R5,348.65 in October 2024, compared to R3,916.72 in October 2020 (PEJDG 2020, 2024). This represents an increase of 36.6 per cent over the four-year period, or an average annual inflation rate of 8.1 per cent. This is slightly higher than the 7.6 per cent annual increase for Statistics South Africa's food price index for all urban areas (own calculations, Statistics South Africa 2024a).

## 3.3. Summary

There is a high concentration of households living in poverty and another group living just above the poverty line. More than 40 per cent of households are below the poverty line under the UBPL, with the poverty gap widest for the poorest 10 per cent of households.

Households at the bottom of the income distribution have seen an increase in average per capita income, while those at the top end have experienced a decline. Households without employed members face a higher incidence of poverty compared to those with at least one employed member, with the poverty rate nearly three times higher for the latter (based on the UBPL).

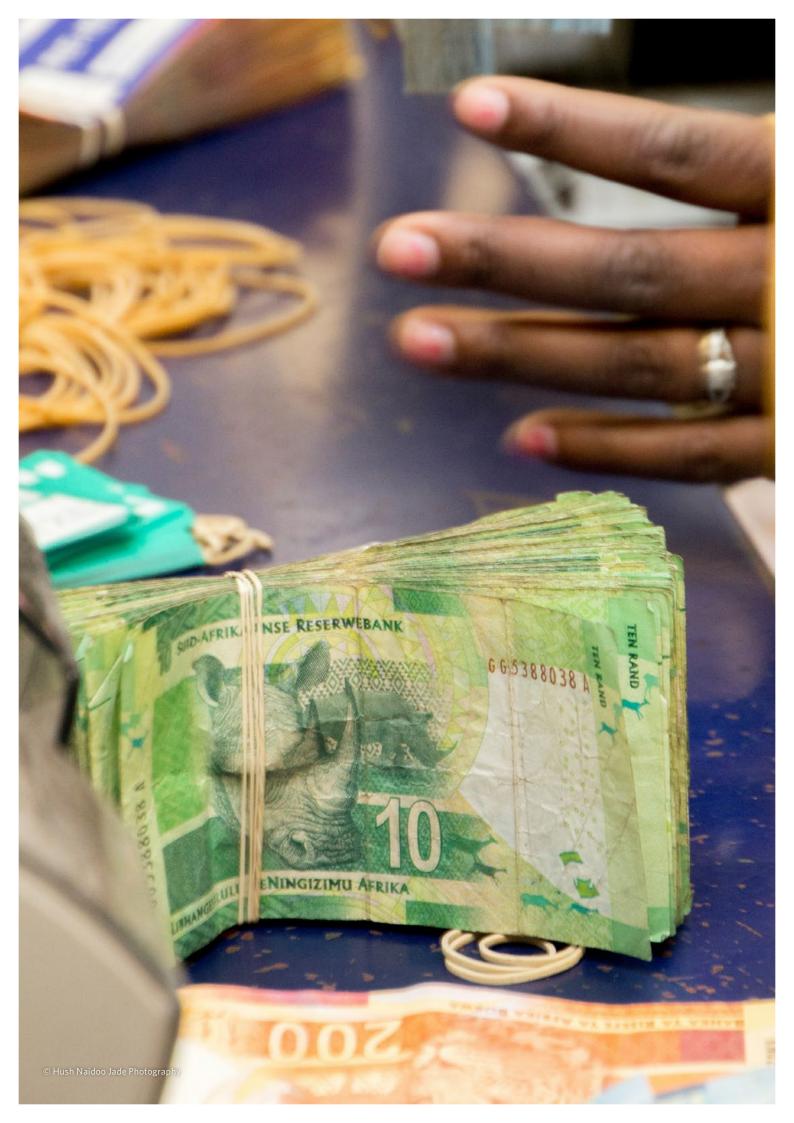
**Households with children are more likely to be poor than those without children.** There has been a modest decrease in poverty among households with children.

**South Africa's income structure has remained largely unchanged over the last twelve years.** Poor households continue to rely heavily on grants, while wealthier households depend on labour earnings. This reliance on labour income for pensions means that poor households, unable to contribute to pension savings, increasingly depend on grants during retirement.

**Social assistance remains a crucial tool for alleviating poverty and narrowing the income gap in South Africa.** The total number of social grants increased from 14.9 million in 2010/11 to 18.8 million in 2022/23, representing a 26.2 per cent increase, and has kept pace with inflation. Two social grants have not kept pace with inflation: the foster care and COVID-19 SRD grants.

**Employment is an important pathway out of poverty.** Policies that create jobs and promote investment are needed to absorb more labour into the economy.

Wages have been relatively stable, with wage growth concentrated at the bottom of the wage distribution. This is likely due to the introduction of labour market regulations. In summary, while there have been some positive trends for households at the bottom of the income distribution, a reduction in poverty for certain groups, and a slight decrease in inequality, income inequality remains stubbornly high.



# 4. Cost of Basic Services

Examining inflation data from a cost perspective is central to understanding changes in the cost of living over time. Inflation measures provide a standardised way to compare price increases across different goods and services, revealing how purchasing power changes. An important feature of modern societies is the general rise in prices, which naturally causes concern for households. However, when prices rise in line with inflation, households are not necessarily worse off over time. They may even experience an improved standard of living if price increases are slower than income increases. Unfortunately, this is often not the case. Many societies, including South Africa, experience price increases that outpace income growth, leading to a decline in real purchasing power. This decline directly results from inflation's impact on the cost of living.

A primary concern for households is the expenditure incurred on a basket of goods and services required to maintain a given standard of living. This basket includes, but is not limited to, items such as food, education, health, transport, utilities, and clothing. At its core, these items are necessary for a household to sustain itself. Notably, households have no control over the prices of many items in the basket. Thus, the commonly derived phrase "cost of living" becomes central when understanding the impact of price increases over time.

This section examines the evolving cost landscape of basic goods and services in South Africa over the past 13 years. The analysis focuses on essential utilities and services that form the foundation of daily life for South African households, including education, food, electricity, water, transport, and healthcare.

# 4.1. Expenditure Patterns across the Income Distribution

Figure 18 presents the composition of household expenditures across the income distribution in South Africa. While housing and utilities, transport, miscellaneous goods and services, and food constitute the top expenditures nationally, accounting for 32.6 per cent, 16.3 per cent, 14.7 per cent, and 12.9 per cent of expenses, respectively, a more nuanced analysis reveals stark disparities between the poorest and richest deciles.

Notably, the poorest 10 per cent of households allocate a substantial 31.1 per cent of their expenses towards food and non-alcoholic beverages, indicating the disproportionate burden basic necessities place on the budgets of poor households. Housing and utilities (29.0 per cent), transport (11.8 per cent), and clothing and footwear (8.0 per cent) follow in importance. In contrast, the richest households prioritise housing and utilities (35.6 per cent), transport (19.6 per cent), miscellaneous goods and services (17.3 per cent), and furniture and equipment (5.2 per cent), with food accounting for just 5.8 per cent of expenditure.

The data highlights significant disparities in expenditure patterns across different income groups, with the poorest households struggling to afford basic necessities. The poorest 60 per cent of households devote more than 25 per cent of their expenses to food, underscoring the significance of this expenditure category for low-income households. Housing expenses remain a significant burden across all income groups, ranging from 25 per cent to 35 per cent of total expenditures, with a national average of 32.6 per cent, highlighting the importance of affordable housing.

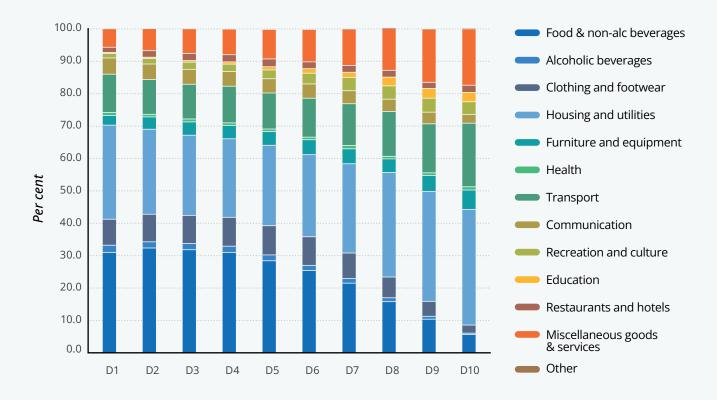


FIGURE 18. Composition of consumption expenditure by decile, 2014

Source: Own calculations, LCS 2014/2015.

Notes: Per cent shares for each category are presented in Table 17 in the appendix.

Transport also constitutes a major expense, with the poorest decile allocating 11.8 per cent and the richest decile allocating 19.6 per cent of their expenses to this category. This finding regarding varying transport expenses highlights differences in transportation needs and access across income levels. Furthermore, the richest 20 per cent of households spend an average of 16.8 per cent on miscellaneous goods and services, such as insurance, personal care, and jewellery, in sharp contrast to the poorest households, which spend considerably less (5.7 per cent for the poorest 10 per cent). This highlights disparities in discretionary household spending and underscores the persistence of inequality and limited economic mobility for low-income households, given the disproportionate burden of basic expenses.

## 4.2. Education

Earlier, Figure 5 showed that education inflation continues to outstrip all other categories. Education comprises only 2.62 per cent of the inflation basket, indicating that it is not one of the larger household expenditures for the average South African household. However, many households incur school fee expenditures that may be significant in relation to their total expenditure.

Education fees are commonly adjusted once per year<sup>5</sup>, usually at the start of the academic year. A breakdown by sub-category within education shows a similar initial growth path for all sub-categories that diverges from approximately 2015 when the Fees Must Fall protests first started (Figure 19). This movement resulted in lower annual increases in university fees, as shown by the stepped green line.

The overall increase in primary and secondary school fees is 153.4 per cent over the period. This yields an annual average inflation rate of 7.31 per cent, which is 2.1 percentage points higher than the headline CPI of 5.2 per cent for the same period. At an annual average inflation rate of 7.31 per cent for primary and secondary school education, household costs doubled in 9.5 years. This means that if households spent R100 on education in 2011, by mid-2019, they were spending approximately R200 on the same education

basket. In contrast, university education costs took 11 years to double, from 2011 to 2021. This substantial rise in a relatively small component of the CPI basket suggests that education inflation has been outpacing overall consumer price increases, potentially having a disproportionate impact on household budgets. This indicates that national inflation figures may not adequately capture the financial pressures faced by families in different regions regarding educational expenses.

180.0 160.0 140.0 Cumulative inflation (%) 120.0 100.0 80.0 60.0 40.0 20.0 0.0 2012 2013 2014 2015 2016 2017 2018 2019 2020 2021 2022 2023 2024 Primary and secondary school fees University fees University boarding fees

FIGURE 19. Cumulative education inflation by sub-category, 2011-2023

Source: Own calculations, Statistics South Africa (2024b).

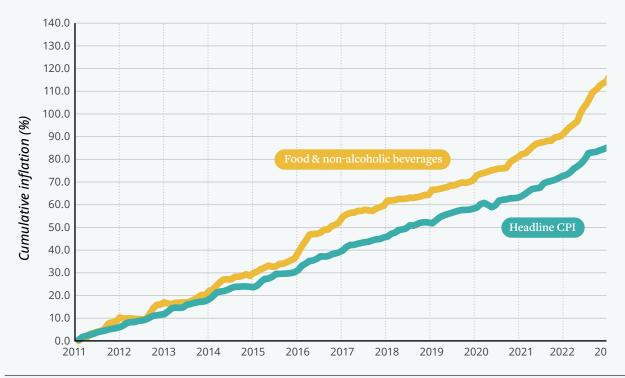
Note: Data for this graph was acquired through a special request to Statistics South Africa for disaggregated data.

These trends, viewed in the context of education's relatively small contribution to the overall CPI, emphasise the importance of monitoring sector-specific inflation rates. They also highlight the need for targeted policies to address rising education costs, particularly in secondary education and in regions experiencing the highest inflation rates, as these increases may be more burdensome than the CPI weighting suggests.

## 4.3. Food

Figure 18 shows that food constitutes more than 30 per cent of expenditure for the poorest 40 per cent of households, making it the largest category of household expenditure for these households. Within the CPI basket, food and non-alcoholic beverages (FNAB) account for 17.14 per cent of the weight, split into 15.3 per cent for food and 1.84 for non-alcoholic beverages. Figure 20 illustrates cumulative headline inflation plotted against FNAB inflation to highlight the relatively higher FNAB inflation rate. Overall, cumulative FNAB inflation is 136.1 per cent between 2011 and 2023, exceeding cumulative headline inflation (94.6 per cent) by 41.5 percentage points by the end of the period. This implies a significantly higher annual food inflation rate of 6.8 per cent over the period compared to 5.2 per cent for headline inflation. The differing inflation trends become more noticeable from the beginning of 2016, widening the differential over time. From 2022, there is an additional widening of the inflation rate, leading to a large overall differential by the end of the period.

FIGURE 20. Cumulative headline and food and non-alcoholic beverages inflation, 2011-2023



Source: Own calculations, Statistics South Africa (2024a).

Figure 21 shows cumulative inflation for the components of FNAB. An examination of the individual categories comprising the food basket reveals that sugar, sweets, and desserts inflation was 197 per cent over the period. Vegetables followed at 150.4 per cent, with oils and fats, milk, eggs, and cheese (dairy), fish, and breads and cereals averaging 137.0 per cent, 136.2 per cent, 135.1 per cent, and 132.7 per cent respectively. Three categories of other food, meat, and fruit also experienced increases of 129.6 per cent, 127.1 per cent, and 64.3 per cent respectively.

FIGURE 21. Cumulative inflation for food and non-alcoholic beverages sub-categories, 2011-2023



Source: Own calculations, Statistics South Africa (2024a).

An important observation is that food inflation shows high volatility over time and variation between categories. This is evident across all food sub-categories but is especially apparent for items such as fruit and vegetables, where some inputs are beyond the producers' control and where seasonality plays a crucial role in the balance between supply and demand, and therefore, in determining prices.

### 4.4. Utilities

Administered prices refer to goods and services whose prices are set or significantly influenced by government policy rather than determined solely by market forces. In South Africa, these include essential utilities like water, electricity, and municipal assessment rates. These prices are often regulated to ensure access to basic services, but they can also create inflationary pressure when increased to cover rising costs or fund infrastructure improvements. Figure 22 illustrates the cumulative inflation of three key administered prices – water, electricity, and assessment rates – from 2011 to 2023. All three categories show significant increases over the 13-year period, with water and electricity prices rising more steeply than assessment rates at approximately twice the average annual inflation rate. This trend indicates that the cost of these essential services has grown substantially faster than general inflation, potentially placing a greater burden on South African households and businesses.

260.0 240.0 220.0 200.0 180.0 **Cumulative inflation (%)** 160.0 140.0 120.0 100.0 80.0 60.0 40.0 20.0 0.0 2011 2012 2015 2016 2017 2018 2019 2020 2021 2022 2023 2024 2014 Water Electricity Assessment rates

FIGURE 22. Cumulative inflation for water, electricity, and assessment rates, 2011-2023

Source: Own calculations, Statistics South Africa (2024a).

Note: Data for this graph was acquired through a special request to StatsSA for disaggregated data

Water prices have seen the most dramatic increase, rising by over 250 per cent cumulatively since 2011. This steep rise reflects the challenges in water management, including infrastructure maintenance, drought management, and the need to expand access to clean water across the country. Electricity prices have also risen significantly, by over 230 per cent during this period. This increase is particularly notable given South Africa's ongoing electricity crisis. The country has been grappling with severe power shortages, frequent load shedding (planned blackouts), and Eskom's financial struggles. Despite these price hikes, South Africa continues to face electricity supply issues, highlighting the complex challenges in aligning pricing, infrastructure investment, and service delivery in the energy sector. Assessment rates have increased at a slower pace compared to water and electricity, rising by about 140 per cent over the

same period. These rates, which are property taxes levied by municipalities, play a crucial role in funding local government services. Their more moderate increase may reflect efforts to balance the need for municipal revenue with the burden on property owners.

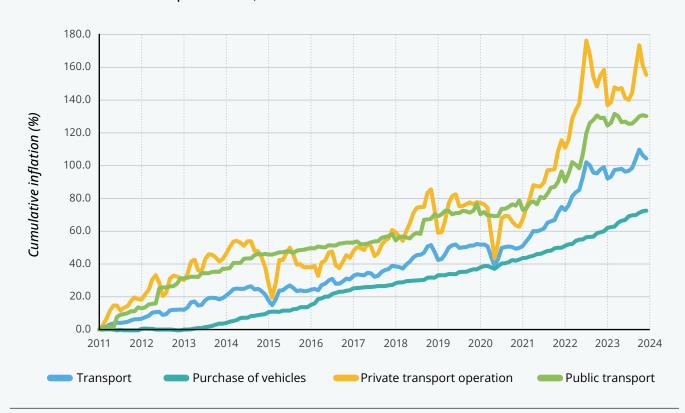
The overall trend of rising administered prices, particularly in essential utilities like water and electricity, presents significant challenges for South African policymakers. They must balance the need to fund and improve these critical services with the impact on affordability and the cost of living for citizens. The steeper rise in utility prices compared to assessment rates also suggests that infrastructure-intensive services are facing more acute cost pressures, possibly due to historical underinvestment or increasing operational challenges.

## 4.5. Transport

Figure 23 illustrates the cumulative inflation trends for various transport-related categories from 2011 to 2023. The categories depicted are overall transport, vehicle purchases, private transport operation, and public transport. Transport accounts for 14.35 per cent of the CPI basket.

The most striking feature of the graph is the sharp divergence in inflation rates among different transport categories, especially after 2020. Private transport operation shows the most dramatic increase, with its cumulative inflation rate soaring to around 160-170 per cent by 2023. This steep rise likely reflects increasing fuel costs and maintenance expenses for private vehicle owners. Public transport follows as the second-highest category, reaching about 130 per cent cumulative inflation by 2023, indicating significant price increases in services like buses and taxis (prices for train transport increased by 87 per cent over the period, according to data obtained from Statistics South Africa). The overall transport category (which represents a weighted average of all transport costs) shows a more moderate increase, reaching about 100 per cent cumulative inflation by the end of the period.

FIGURE 23. Cumulative transport inflation, 2011-2023



Source: Own calculations, Statistics South Africa (2024a).

Interestingly, the vehicle purchase category demonstrates the lowest cumulative inflation rate, growing steadily but more slowly than the other categories and reaching only about 70 per cent by 2023. This suggests that while the costs of operating and using transport have risen dramatically, the relative cost of purchasing vehicles has increased at a slower pace. The graph also shows notable volatility in the private transport operation category, with sharp fluctuations particularly evident from 2020 onwards, possibly reflecting the impact of global events such as the COVID-19 pandemic and oil price fluctuations. Overall, this graph underscores the significant and uneven increases in transport-related costs in South Africa over the past decade, with operational costs outpacing vehicle purchase prices and public transport costs rising considerably.

### 4.6. Free Basic Services

At the core of the government's commitment to the people of South Africa is the pledge, through the South African Constitution, to provide access to basic services including water, electricity, sewerage and sanitation, and solid waste management. Housing and utilities, along with food and non-alcoholic beverages, constitute the largest household expenditure categories (Figure 18). The figure shows that housing and utilities account for a significant proportion of household expenditure across all income deciles and remain a key category of expenditure irrespective of income. Within the CPI basket, basic services—calculated as the sum of water and other services and electricity and other fuels—constitute approximately 7.16 per cent of the expenditure basket. By extending free basic services, the effective weight of these services in the CPI basket can be reduced for poor households, alleviating pressure on household budgets and serving to at least partially insulate households from rising prices.

Data from the *Non-financial Census of Municipalities (NFCM)* describe patterns and trends in the supply of free basic services across the country. This census of all 257 municipalities provides information on the delivery of water, electricity, sewerage and sanitation, and solid waste management (refuse removal) for planning and monitoring in relation to national priorities around service provision and poverty alleviation (Statistics South Africa, 2024c). This survey provides data on the supply side or provision of basic services by local or district municipalities, achieving a 100 per cent response rate. The unit of analysis in household surveys is households, while in the NFCM, services are analysed in terms of consumer units, defined as the delivery point to which a service is billed. This may be a household. It cannot therefore be assumed that households and consumer units are identical, nor can the same level of service delivery to households and consumer units be inferred.

The free basic services policy, first introduced in 2001, stipulates that consumer units, defined as the delivery point or billing unit of a municipality's basic services, may benefit from free or subsidised access to these services. Specifically, consumer units may receive a free allocation of water (6 kl) and electricity (50 kWh), with the amounts determined by the National Framework for Municipal Indigent Policies of 2005 and the Guidelines for the implementation of the national Indigent Policy by municipalities (2006). Access to sewerage and sanitation and solid waste management (refuse removal) is commonly subsidised by a fixed amount of R50 per household.

Figure 24 shows the provision of four basic services in South Africa between 2011 and 2022. All four basic services exhibited an increase in their provision by municipalities, with an average increase of approximately 40 per cent across all categories. Specifically, sewerage and sanitation services increased the most at 43 per cent, while water provision rose by 39 per cent over the period. These percentage increases represent an overall rise in service provision of between 3.2 million and 4.3 consumer units.

FIGURE 24. Provision of basic services, 2011-2022

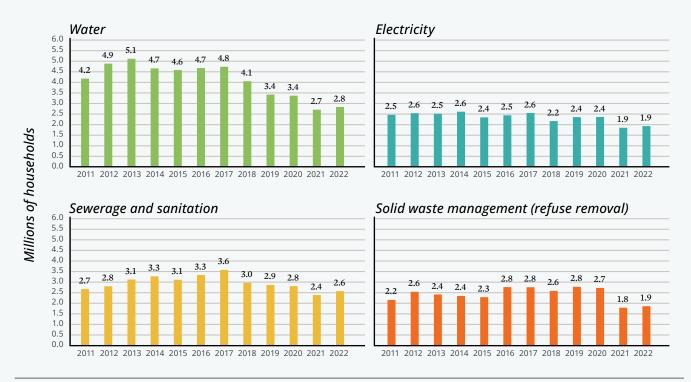


Source: Own calculations, NCFM (2024).

Note:

The provision of basic services is recorded at the consumer unit or billing unit level and is not directly comparable with other household surveys. Data is released with a two-year delay with 2022 data the most recently publicly available dataset.

FIGURE 25. Provision of Free Basic Services, 2011-2022

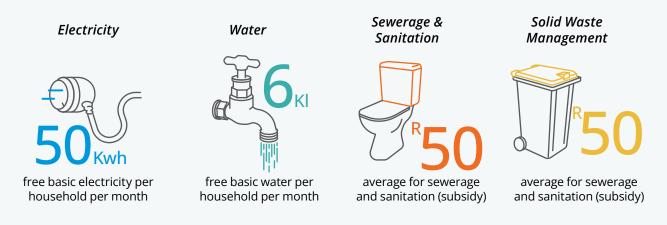


Source: Own calculations, NCFM (2024).

The provision of basic services is recorded at the consumer unit or billing unit level and is not directly comparable with other household surveys. The provision of free basic services is recorded at the household level and is therefore not directly comparable to data recorded at the consumer unit level. Data is released with a two-year delay with 2022 data the most recently publicly available dataset.

While the national picture portrayed in Figure 24 suggests a significant improvement in the provision of basic services, with overall provision increasing between 2011 and 2022, Figure 25 highlights the uneven nature of this rollout. In 2011, more than 4.1 million households received free basic water services. By 2022, this number had decreased to 2.8 million, a decline of over 1.3 million households. A similar pattern of decline is observed across the three remaining categories. However, the extent of the decline is much smaller than that of water, with declines of 500,000; 95,000; and 300,000 households for free basic electricity, free basic sewerage and sanitation, and free basic solid waste management, respectively.

FIGURE 26. Free basic service allocations for indigent households



Source: DPLG (2005).

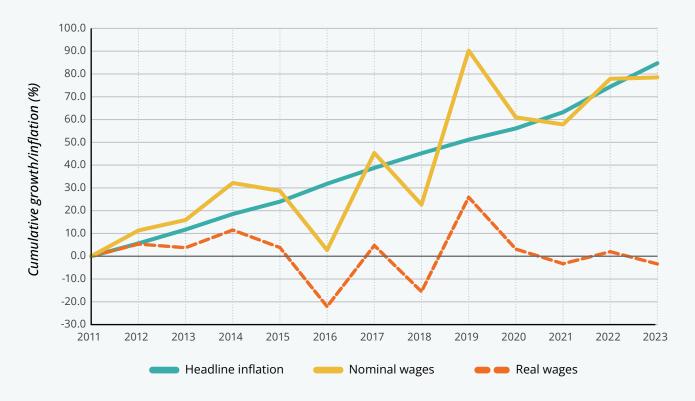
The National Development Plan (2012) outlines the government's socioeconomic development strategy, including measures to lower the cost of living for poor households through service subsidies or expenditure reductions. Free and subsidised basic services, such as water, electricity, sewerage, sanitation, and solid waste management, directly reduce the cost of living for poor households and represent a targeted approach to poverty alleviation and inequality reduction within the government's reach.

## 4.7. Inflation and Wages

Figure 27 presents a comparative view of cumulative inflation, nominal wages, and real wages in South Africa over the past 13 years. The cumulative inflation line represents the total increase in the general price level of goods and services over time, illustrating the erosion of purchasing power. The nominal wages line, represented by mean nominal wages, shows the actual monetary value of wages as they have increased over the years without adjusting for inflation, reflecting the face value of what workers earn. The real wages line, derived by adjusting nominal wages for inflation, represents the true purchasing power of workers' earnings over time.

By plotting these three measures together, we can discern the net position of South African consumers and workers. The relationship between the nominal wage line and the inflation line indicates whether wage increases have kept pace with rising prices. The real wage line, however, tells the most crucial story—it shows whether workers' purchasing power has improved, remained stable, or declined over the 13-year period. If the real wage line rises above its starting point, it suggests that wage growth has outpaced inflation, leading to improved living standards. Conversely, if it falls or remains flat, it indicates that despite nominal wage increases, workers' buying power has stagnated or decreased, potentially resulting in a lower standard of living through an erosion of purchasing power. This graph thus provides a comprehensive picture of how economic forces have impacted the financial well-being of South African workers over time.

FIGURE 27. Wage and inflation trends, 2011-2023



Source: Own calculations, GHS (2011-2023), StatsSA (2024b).

Note: Annual averages presented in this graph may differ from monthly averages due to aggregation methods. Annual figures smooth out short-term fluctuations and provide a broader trend perspective, while monthly data capture more granular changes throughout the year.

By the end of 2023, South Africans had lost a marginal 3.4 per cent in real wages compared to 2011. This means that despite any nominal wage increases, when adjusted for inflation, the average worker can buy 3.4 per cent fewer goods and services at the end of the period than they could at the beginning. This can be viewed in a few ways. First, the average worker's standard of living has slightly decreased over the 13-year period. Second, nominal wage increases have not fully kept pace with the rising cost of living. Third, workers are slightly worse off in real terms than they were 13 years ago.

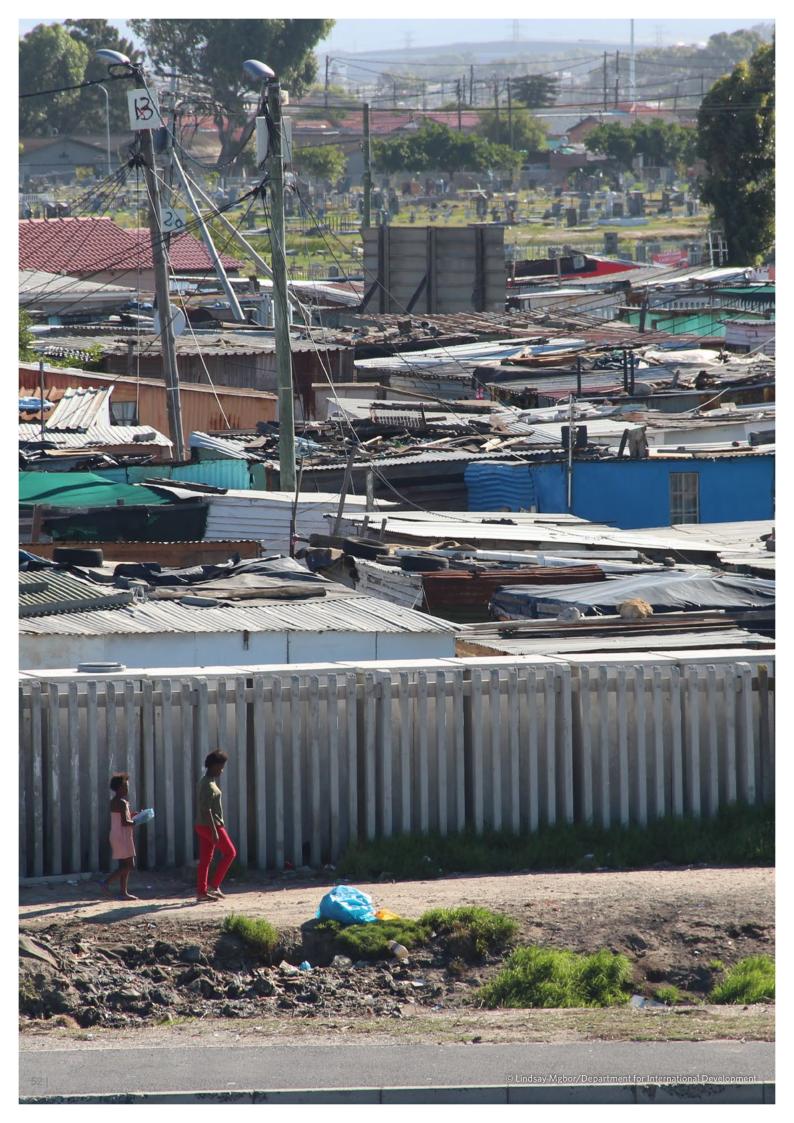
The negative real wage position in 2023 underscores the challenges faced not only by workers but also by the households in which these workers reside to maintain their living standards amid rising prices, highlighting the potential impact of broader economic conditions in South Africa over this period.

## 4.8. Summary

- Persistent above-target inflation remains a reality for many key household expenditure
  categories. Many essential goods and services have consistently experienced inflation rates exceeding
  the South African Reserve Bank's target range, eroding purchasing power faster than incomes can
  keep up and impacting living standards.
- Education, transport, and utilities have experienced particularly high inflation rates, outpacing general consumer price increases. This trend places significant pressure on household budgets, especially for lower-income families. Regional variations have not narrowed over time.
- Administered price pressures are a concern. Utilities such as electricity and water have experienced substantial price increases, often driven by infrastructure challenges and the need for service expansion. These administered price hikes have a cascading effect on overall living costs.

- The cumulative effect of these inflationary trends over the 13-year period has been substantial, with many essential goods and services now significantly more expensive relative to income levels. This sustained inflation, particularly in critical sectors like education, healthcare, and utilities, poses serious challenges to social equity and economic development in South Africa.
- The disparities in inflation rates across various goods, services, and regions highlight the need for nuanced approaches to economic management and social support. As South Africa continues to grapple with these inflationary challenges, maintaining a focus on inclusive growth and equitable access to essential services will be crucial in ensuring a sustainable and prosperous future for all citizens.
- The provision of free basic services reduces pressure on poor households' budgets and insulates them from price increases by decreasing the weight of these services in their expenditure bundles. However, the most recent data from municipalities suggests a scaling back in the provision of free basic services, with all four services seeing reductions in the number of households benefiting over the 2011-2023 period.





# 5. Access to Basic Services

# 5.1. Housing

Households devote a large portion of their income to housing expenses, contributing to a high cost of living. According to data from the Living Conditions Survey (LCS) 2014/15 (Stats SA, 2017a), housing and rental expenses (excluding utilities and maintenance costs) accounted for 24.1 per cent of average annual household expenditure in South Africa. Socioeconomic factors such as rising income inequality, slow wage growth, and high unemployment reduce the likelihood of households finding affordable housing.

The South African Constitution guarantees the right to sufficient housing (Section 26(1) and (2)). This includes access to housing options like ownership and renting, as well as shelter provision. However, South Africa's current urban landscape has been shaped by the spatial planning legacy of the apartheid era (Goebel, 2007; Turok, 2011). Apartheid's forced relocations and community segregation amplified the scarcity of affordable housing in cities, exacerbating socioeconomic disparities. For example, poor or low-income black communities have often been marginalised and forced to live on the outskirts of cities, distant from employment opportunities and amenities (Seekings, 2000). Inferior-quality housing, deteriorating infrastructure, and a lack of maintenance have contributed to South Africa's historical housing challenges (Huchzermeyer, 2001). Moreover, social housing projects have often been of poor quality (Manomano and Tanga, 2018). Migration, urbanisation, and population growth also drive housing costs by raising demand in some areas while depressing it in others.

Figure 28 presents an alluvial diagram of housing for South African households in 2023. It is evident that in 2023, a randomly chosen household in South Africa will most likely be headed by an African, reside in an urban setting, live in a formal dwelling, and own their home debt-free. Overall, 65.9 per cent of households reside in urban areas, while 83.1 per cent have African heads; 85.5 per cent of households live in formal dwellings, and 72.0 per cent own their dwellings; of those that own their dwellings, 90.3 per cent own them debt-free.

The vast majority of rural households are headed by Africans (0.331/0.341=97.1 per cent); this proportion is roughly the same as in 2011. More than four out of five (0.693/0.831=83.3 per cent) African-headed households reside in formal dwellings, up from 74.6 per cent in 2011. Informal dwellings are almost universally (0.138/0.145=95.2 per cent) occupied by African-headed households. Households headed by Coloured, Asian, or White individuals rarely reside in informal dwellings, with 95.9 per cent (=0.162/0.169) reporting that they live in formal dwellings, marginally lower than the 97.1 per cent in 2011.

Roughly three-quarters (0.633/0.855=74.0 per cent) of households living in formal dwellings own their homes, with or without debt. This is higher than the ownership rate of 60.0 per cent (=0.087/0.145) for informal dwellings. Nine out of ten (90.3 per cent) households that own their dwellings do so without debt, marginally up from 87.3 per cent in 2011. The findings suggest that historical settlement patterns still dominate the South African housing landscape. The small decline of informal dwellings among Africans indicates marginally better living conditions and access to services.

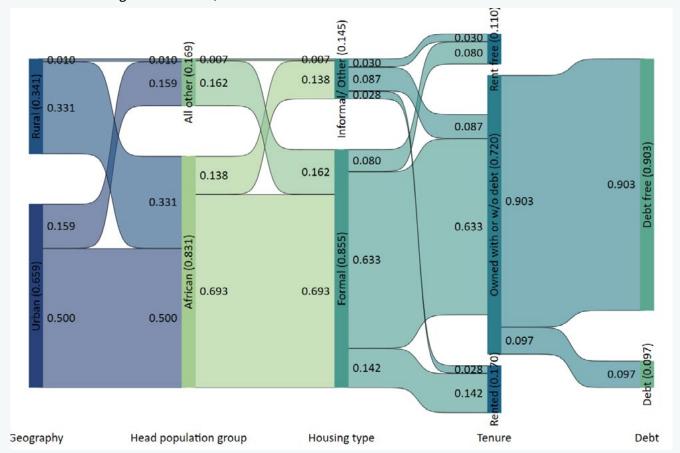


FIGURE 28. Housing in South Africa, 2023

Source: Own calculations, GHS 2023.

The trend towards urbanisation from 2011 to 2023 is reflected in Figure 29, which presents patterns of dwelling type by income category. There has been a decline in the share of traditional dwellings and an increase in the share of formal dwellings during this period. The poorest 40 per cent and the middle 40 per cent of households show the largest shifts: the share of formal dwellings rose by 9.3 percentage points for the poorest 40 per cent and by 5.3 percentage points for the middle 40 per cent, while the proportion of traditional dwellings fell by 9.8 percentage points to 7.4 per cent and by 3.2 percentage points to 2.2 per cent for these two groups, respectively. Mlambo (2018: 66) suggests that the pursuit of higher quality and availability of basic services (healthcare and educational facilities) and better economic opportunities (employment and higher income prospects) may explain the drivers of migration from South Africa's rural to urban areas. The former is associated with the poorest 40 per cent of households, who, as this analysis will show, typically have lower levels of access to services and often migrate to informal dwellings, indicating a lack of adequate affordable urban options. The latter is more likely to be associated with the middle 40 per cent, who—as will be seen—typically have access to resources and services, but not necessarily the same quality as the richest 20 per cent.

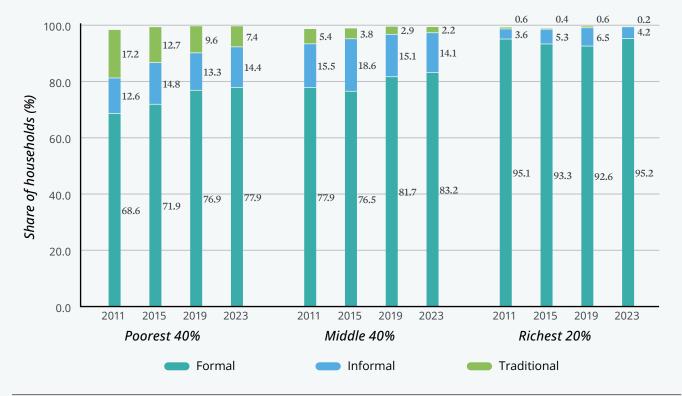


FIGURE 29. Dwelling type by income group, 2011-2023

Source: Own calculations, General Household Survey (2011-2023).

Notes: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. Formal dwellings are permanently constructed houses made of materials such as bricks, concrete, or mortar, including flats, townhouses, and semi-detached houses. Informal dwellings are non-permanent or makeshift structures, including shacks in backyards, informal settlements, or squatter camps, and farms with non-permanent dwellings. Traditional dwellings are dwellings or huts constructed from traditional materials, such as mud, thatch, or wood. Other and unspecified dwelling types are not presented.

Figure 30 shows home ownership and rental patterns from 2011 to 2023 across income groups. Home ownership is typically a significant investment for households, and therefore changes in ownership levels occur more slowly than changes in migration. Over this period, there has been a gradual shift towards home ownership for the poorest 40 per cent and the richest 20 per cent of households. Among the richest 20 per cent, there has also been a gradual shift away from debt, with the proportion of households owning their dwellings with debt falling from 26.2 per cent in 2011 to 22.7 per cent in 2023, while the share owning their dwelling outright increased from 32.8 per cent to 37.7 per cent. Although changes over the period have been small, there are stark disparities in tenure across the income distribution. For example, home ownership through debt and renting appears to be more accessible to higher-income households; thus, the top 20 per cent are more than 20 times more likely than those in the poorest 40 per cent to own dwellings with debt in 2023. This is likely a manifestation of poorer households' lower spending power, as well as strict lending standards and high interest rates, which restrict access to credit for the poorest households. Moreover, the benefits of state-subsidised housing are limited because these homes have little market value, making them less suited for facilitating upward mobility or yielding financial returns (Lemanski, 2010). These dynamics perpetuate existing inequalities, as people who cannot access credit are left behind in lower-quality neighbourhoods with limited amenities (lack of access to clean water, poor sanitation, and vulnerability to natural disasters). In contrast, those who can access credit can purchase homes in better-serviced areas.

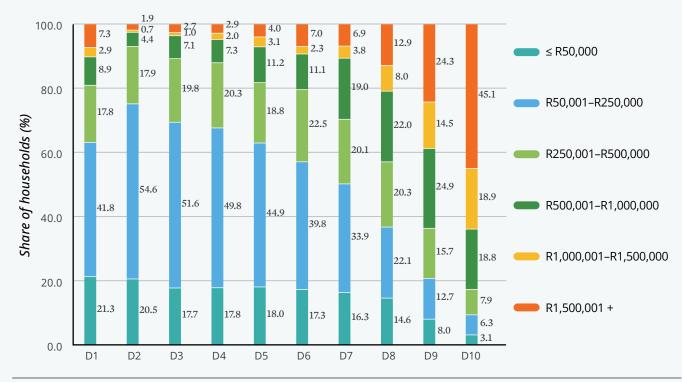
FIGURE 30. Dwelling tenure by income group, 2011-2023



Source: Own calculations, General Household Survey (2011, 2015, 2019, 2023).

Notes: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. Shares do not add to 100 as the 'Other' category is omitted.

FIGURE 31. Estimated market value of formal dwellings by income decile, 2022



Source: Own calculations, General Household Survey (2022).

Notes: Income categories derived from the imputed household income variable as described in Box 1. Deciles are arranged from poorest (decile 1, or D1) to richest (decile 10, or D10). Approximate market value data is not available for 2023 and therefore 2022 data is used. Values are nominal Rands as at the time of the survey.

Figure 31 highlights the stark differences in the value of property assets—in the form of formal dwellings owned by households—across the income distribution in South Africa. The distribution of housing assets in South Africa is characterised by significant inequality, even though this asset class has the lowest inequality. Compared to other asset types, property assets are comparatively more accessible. In 2022, 64.0 per cent of decile 10 households residing in formal dwellings have properties with market values exceeding R1 million. In contrast, 63.1 per cent of households in the poorest decile living in formal dwellings have properties valued at no more than R250,000, a proportion that rises to 75.1 per cent in decile 2.

These findings are consistent with the work of Chatterjee et al. (2020), who found that the top 10 per cent of the population in South Africa hold almost three-fifths (58.8 per cent) of the country's housing assets, while the bottom 50 per cent own just 14.0 per cent. There are consequences to this concentration of wealth, particularly for the most vulnerable groups who are also less able to access credit. Because they own fewer assets, the poorest households are more susceptible to shocks such as job loss or medical emergencies.

Further analysis of the data on measures of dwelling quality—as indicated by the median number of rooms per household member—shows rising densities as one moves down the income distribution. The median number of rooms per household member is one for the poorest 40 per cent of households, two for the middle 40 per cent, and three for the top 20 per cent. In other words, poor households are more likely to experience overcrowding and poor living conditions compared with better-off households.

Figure 32 illustrates the contrast in monthly housing costs—rental and mortgage payments—for households across the income distribution. The figure excludes households that own their properties outright. As expected, poorer households spend less than better-off households, while those residing in formal dwellings tend to spend more than those in informal dwellings. Among households renting or owning their formal dwellings with debt, seven out of ten (70.6 per cent) in the top 20 per cent spend more than R3,000 per month, compared to one-fifth (19.6 per cent) of their counterparts in the poorest 40 per cent. Among the poorest 40 per cent renting or owning formal dwellings with debt, 51.3 per cent spend up to R1,000 per month in rental or mortgage payments; this proportion falls to 34.1 per cent in the middle 40 per cent, and just 11.3 per cent in the top 20 per cent. In contrast, less than four per cent of households in informal dwellings spend more than R3,000 per month, irrespective of income group. Indeed, the proportions of households spending up to R1,000 per month for informal dwellings differ only slightly across income categories: 93.5 per cent of households in the poorest 40 per cent, 93.2 per cent in the middle 40 per cent, and 89.3 per cent in the top 20 per cent.



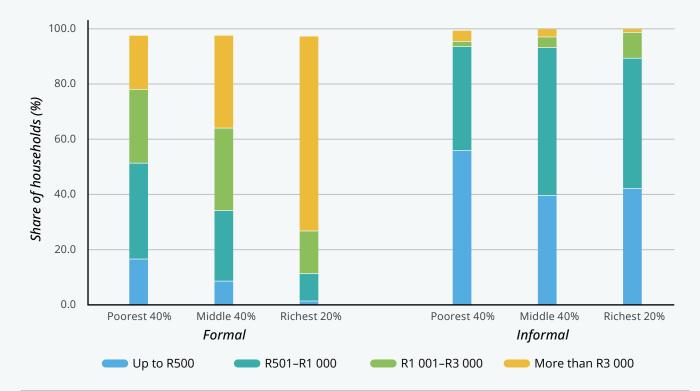


FIGURE 32. Monthly housing costs paid by dwelling type and income, 2023

Source: Own calculations, General Household Survey (2023).

Notes: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. Monthly housing costs include rent and mortgage payments. Shares do not add to 100 due as the 'unspecified' category is omitted.

## 5.2. Household Assets

Figure 33 depicts access rates to household assets across income groups in 2023, with households in the top 20 per cent enjoying consistently higher access rates for all assets included in the figure. However, the variation in access rates between the three groups differs significantly depending on the item in question. Essential household goods are more uniformly accessible, though still reflecting a gap. For example, the differences in access rates between households in the richest and poorest categories are relatively small for items like refrigerators (22 percentage points), stoves (5 percentage points), and televisions (18 percentage points). Similarly, for less critical items, the gap is slightly larger: pay-TV (26 percentage points) and microwave ovens (44 percentage points). The most pronounced disparities in asset ownership between the richest and poorest households are observed for assets requiring water-related infrastructure, such as geysers (58 percentage points), washing machines (45 percentage points), and sinks (51 percentage points), as well as high-cost items like cars (61 percentage points), computers (51 percentage points), and home security systems (32 percentage points).



FIGURE 33. Ownership of household assets by income category, 2023

Source: Own calculations, General Household Survey (2023).

Notes: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. Figures in brackets refer to the proportion of households in the income group with access to the given asset.

Higher-income households tend to own more consumer durables, which can provide long-term cost savings. For example, a refrigerator reduces the need for daily shopping, saving time and transport costs, and makes bulk purchases—typically associated with lower unit costs—more viable. The poorest households may incur higher daily costs without these items; for instance, without a refrigerator, they might buy perishable goods more frequently and at a higher total cost. Similarly, the lack of a vehicle can hinder access to better job opportunities, educational facilities, or healthcare services, leading to social and economic exclusion and reinforcing existing inequalities. Limited access to time-saving technologies, such as washing machines, can result in more time spent on household chores, time that could have been dedicated to education or income-generating activities. Therefore, differences in the ownership of consumer durables between the richest and poorest households not only increase living expenses for the latter but also restrict economic mobility.

## 5.3. Utilities and Services

#### 5.3.1. OVERALL ACCESS TO UTILITIES

Differences in the availability of essential services reflect broader socioeconomic inequalities. Figure 34 presents rates of household access to six services—electricity, piped water on site, flush toilets, refuse removal, cellular telephony, and internet connection—for 2011 and 2023, highlighting the disparities in access between income groups and how this has changed over the period. The richest 20 per cent of households have the highest rates of access to each of these services, although their access to refuse removal and piped water on site may have declined slightly. In contrast, the poorest 40 per cent of households have the lowest rates of access to these services. However, there are two important exceptions where access rates for the poorest 40 per cent of households are not significantly different from those for the middle 40 per cent: electricity and cellular telephony. For these two services, not only are access rates for these groups very similar, but they are also relatively close to those for the top 20 per cent of households, particularly in 2023.

95.9 100.0 93.0 93.1 89.7 88.1 82.0 79.1 78.2 80.0 68.5 Share of households (%) 70.1 63.9 58.4 60.0 45.7 46.7 41.8 40.0 20.0 10.8 5.1 0.0Middle 40% Middle 40% Poorest 40% Richest 20% Poorest 40% Middle 40% Widdle 40% Richest 20% Richest 20% Poorest 40% Richest 20% Richest 20% Poorest 40% Poorest 40% Middle 40% Poorest 40% Middle 40% Richest 20% Electricity Piped water Flush toilet Refuse removal Cellphone Internet on site 2011 2023

FIGURE 34. Access rates to selected utilities by income category, 2011 and 2023

Source: Own calculations, General Household Survey (2011, 2023).

Notes: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year.

In contrast to electricity and cellular telephony, gaps in access rates for the other four services are considerably larger, with access for the middle 40 per cent of households typically around halfway between that for the poorest and richest groups. Internet access is a notable outlier in this regard: while around two-fifths (44.4 per cent) of the richest 20 per cent of households had internet access in 2023, this was true for just 10.8 per cent of the middle 40 per cent of households and 3.3 per cent of the poorest 40 per cent.

Across these six services, access rates have generally risen slightly over the period. However, electricity access for the bottom 80 per cent of households and internet connection for the top 20 per cent of households saw relatively large increases. For electricity, access rates increased by 14.2 percentage points

for the poorest 40 per cent of households and by 11.7 percentage points for the middle 40 per cent to 93.3 per cent and 93.7 per cent respectively. Internet access for the top 20 per cent of households increased by 7.2 percentage points to 44.4 per cent in 2023. Cellphone access also increased by around seven percentage points for the poorest 40 per cent and middle 40 per cent of households to 94.8 per cent and 96.0 per cent respectively in 2023.

Table 8 presents rates of access to these six utilities by province. Rates of access to electricity are uniformly high, ranging from 91.3 per cent of households in Gauteng to 98.0 per cent in the Western Cape. In contrast, there is significant variation in access to piped water on site, flush toilets, and refuse removal. Gauteng performs best in terms of piped water on site (91.9 per cent of households) compared to just 45.6 per cent in Limpopo. Limpopo also has the lowest rates of access to flush toilets and refuse removal: its rate of access to flush toilets is 30.0 per cent compared to 95.4 per cent in the Western Cape, while only one-quarter of Limpopo households have access to refuse removal, compared to between 80 per cent and 90 per cent in Gauteng and the Western Cape. Household-level access to cellphones ranges from 89.8 per cent in the Northern Cape to almost 98 per cent in Gauteng, Mpumalanga, and Limpopo. In contrast, while two-fifths (40.1 per cent) of Western Cape households and one-fifth (21.5 per cent) of Gauteng households report having access to a fixed internet connection at home, this was true for just 3.1 per cent of households in Mpumalanga and 4.5 per cent in Limpopo. Even the Eastern Cape, which has the third-highest rate of access to the internet, trails with access at just 7.7 per cent.

TABLE 8. Access to selected utilities by province, 2023

	Electricity	Piped water on site	Flush toilet	Refuse removal	Cellphone	Internet
Western Cape	98.0	87.9	95.4	87.9	94.9	40.1
Eastern Cape	95.6	50.4	47.6	42.4	92.5	7.7
Northern Cape	94.7	76.2	72.2	65.7	89.8	7.4
Free State	94.0	86.8	77.0	68.9	93.5	6.3
KwaZulu-Natal	97.4	67.6	51.0	51.9	96.9	6.9
North West	92.3	65.8	50.5	50.3	95.5	5.3
Gauteng	91.3	91.9	87.1	83.5	97.6	21.5
Mpumalanga	92.6	72.5	45.0	43.8	97.6	3.1
Limpopo	97.7	45.6	30.0	24.6	97.7	4.5
South Africa	94.5	75.1	66.0	62.6	96.2	14.5

Source: Own calculations, General Household Survey (2023).

Figure 35 presents the provincial ranking of utility interruptions and environmental issues experienced by South African households in 2023, providing context on the quality of service delivery and environmental conditions. A higher vertical position in the graph indicates that a larger share of households in that province experiences these utility interruptions or environmental problems. Issues are ranked from left to right in ascending order of incidence; in other words, problems further to the right are, on average, experienced by a larger proportion of households. Figure 35 relates to the cost of living in terms of how utility interruptions can increase household expenses: Load-shedding necessitates alternative energy sources (e.g., generators, candles), and water supply interruptions may incur additional costs to ensure access to water. Moreover, environmental problems may lead to extra costs for waste removal services (if municipal collection is irregular or non-existent), healthcare (due to water and air pollution), and property maintenance (due to land degradation, excessive noise, and littering).

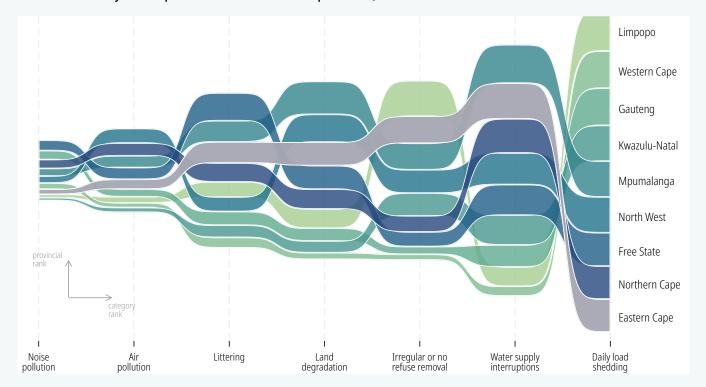


FIGURE 35. Utility interruptions and environmental problems, 2023

Source: Own calculations, GHS (2023).

Notes: Vertical position: provincial

Vertical position: provincial rank, where higher positions indicate better performance (lower share of utility interruptions or environmental problems). Thickness: Proportion of households experiencing each utility interruption or environmental problem. Horizontal sorting: Categories are arranged by the national prevalence of each utility interruption or environmental problem, from most to least affected households. Refer to Table 18 in the appendix for estimates of the proportion of households experiencing each problem.

Nationally, 13.7 per cent of households report experiencing noise pollution, while 16.9 per cent report air pollution. Roughly one-third of households report problems with littering, land degradation, or irregular or no refuse collection. Just over half (55.2 per cent) of households report experiencing water supply interruptions, while more than three-quarters (77.5 per cent) report power disruptions. Environmental issues and frequent utility outages can cause property prices to decline, negatively impacting households' wealth and limiting local government revenue. For instance, sewage discharges from load-shedding have been linked to a decline in real estate values in affected areas (Winter, 2011:59). Moreover, interruptions in service provision drive up living costs by increasing business operating costs. For example, small businesses incur higher expenses due to power outages (caused by aged infrastructure and cable theft) (Schoeman and Saunders, 2018). Additional costs are ultimately passed on to customers.

#### 5.3.2. WATER AND SANITATION

Figure 36 presents an overview of household water and sanitation access in South Africa in 2023. The majority of urban households—89.1 per cent (=0.621/0.697)—report access to piped water on site, whereas most rural households do not (0.174/0.303=57.4 per cent). This means that four out of five households with piped water on site are located in urban areas. Three in five (60.2 per cent) households with access to water on site have piped water in their dwellings; this represents 45.2 per cent of all households.

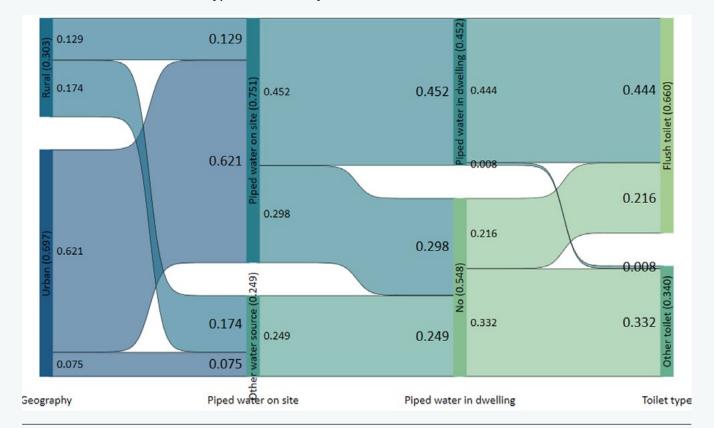


FIGURE 36. Access to water and type of toilet facility, 2023

Source: Own calculations, General Household Survey (2023).

The vast majority (98.2 per cent) of households with piped water in their dwellings also have access to a flush toilet. Additionally, 39.4 per cent of households without piped water have access to a flush toilet. This means that two-thirds (66.0 per cent) of all households have access to a flush toilet.

Table 9 shows that on-site access to piped drinking water in dwellings is correlated with socioeconomic status. Households with higher income levels, those above the poverty line, urban households, maleheaded households, households residing in formal dwellings, and households without children are more likely to have on-site access to piped water. While 45.2 per cent of households nationally have access to piped water, this figure rises to 53.0 per cent in formal dwellings, 60.7 per cent in urban households, over 90 per cent of Asian and White households, and 56.5 per cent of non-poor households. These patterns align with the findings of Rhodes and McKenzie (2018), and Cole et al. (2018).

Between 2011 and 2023, access to in-dwelling piped water improved for households in informal dwellings (+12.5 per cent), African-headed households (+14.6 per cent), female-headed households (+11.4 per cent), the poorest decile of households (+5.2 per cent), households below the poverty line (+13.0 per cent), and households with children (+8.8 per cent). However, the quality of services appears to have deteriorated: more households experienced supply interruptions, and the proportion of households treating their drinking water doubled over the period. Further investigation of the data indicates that although interruptions occur more frequently, their duration is less likely to persist for extended periods.

TABLE 9. Household access to piped water in dwelling by household characteristic, 2011-2023

	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	%
National average	44,6	44,6	45,4	46,3	46,0	46,6	46,7	46,3	44,9	46,6	45,2	45,8	45,2	1,3
Formal	56,1	56,8	56,7	56,2	56,9	56,5	56,4	55,3	53,7	54,8	53,3	54,1	53,0	-5,5
Informal	5,6	7,2	5,5	8,0	7,2	8,7	8,1	7,4	4,8	2,8	2,4	4,7	6,3	12,5
Urban	62,5	61,6	62,6	63,9	62,6	63,2	63,1	62,6	61,2	63,2	61,6	61,6	60,7	-2,9
Rural	25,4	26,5	25,3	24,4	28,0	26,6	25,3	26,5	26,7	27,2	25,5	31,1	30,3	19,3
African	31,4	31,6	33,2	34,6	34,6	35,6	36,2	36,1	34,4	36,5	35,2	36,3	36,0	14,6
Coloured	83,4	81,8	82,3	82,8	82,7	82,7	82,9	82,4	86,5	85,3	86,4	85,7	85,6	2,6
Asian	96,9	96,3	96,1	96,9	94,7	94,8	94,7	93,5	95,5	98,1	91,7	95,5	94,9	-2,1
White	95,0	97,2	95,6	95,8	95,4	95,5	93,8	94,0	92,9	94,8	94,4	92,8	91,3	-3,9
Male HH head	48,0	47,9	48,7	49,7	48,9	49,1	48,6	48,6	46,8	48,4	47,5	47,4	46,0	-4,2
Female HH head	39,6	39,8	40,8	41,6	42,0	43,1	43,9	43,2	42,3	44,2	42,1	43,6	44,1	11,4
Poorest decile	30,7	29,5	35,6	32,2	36,1	61,1	33,2	57,6	28,0	36,2	34,1	34,7	32,3	5,2
HH below upper bound poverty line	24,7	24,7	26,8	25,9	28,3	37,7	27,9	34,7	25,7	28,9	27,2	28,5	27,9	13,0
HH above upper bound poverty line	58,4	57,8	58,0	58,5	56,2	54,6	57,5	53,5	56,2	59,6	57,4	57,0	56,5	-3,3
Richest decile	88,2	90,2	88,4	89,2	86,9	82,8	87,3	71,6	83,2	88,4	86,8	86,4	85,3	-3,3
HH w/o child	47,8	47,3	48,4	49,3	47,6	47,4	47,7	47,6	46,9	50,3	46,7	46,4	46,0	-3,8
HH with child	41,9	42,1	42,8	43,8	44,6	45,9	45,7	45,1	43,1	43,7	44,0	45,2	44,5	6,2
Treatment	8,0	10,2	8,3	8,8	8,9	8,9	9,7	10,4	11,2			17,6	14,6	82,5
Interruptions	38,2	40,8	39,7	37,2	42,2	41	37,4	34,3	38,7	37,6	40,5	48,9	49,6	29,8
low													high	

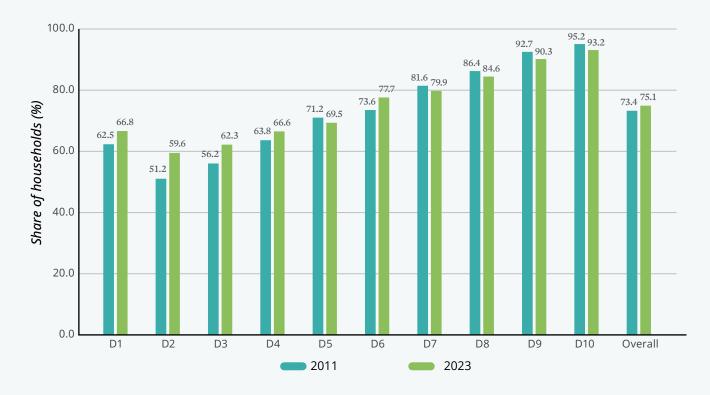
Sources: Own calculations, GHS (2011-2023).

Notes: The heatmap table values represent the share of households with access to water in their dwelling. Treatment refers to whether the household boils, adds chlorine or other chemicals, or filters drinking water. Interruptions refer to any disruptions within the last 12 months. The final percentage (%) column represents the change between 2011 and 2023. Income categories are derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year.

Between 2011 and 2023, household access to piped water on-site increased slightly from 73.4 per cent to 75.1 per cent (Figure 37). Access to piped water on-site is positively correlated with per capita household income: while around three out of five households in deciles two and three have access, this is true for nine out of ten households in deciles nine and ten. Decile one is an exception, exhibiting higher access rates than deciles two through four in both years. Meanwhile, changes in access across the income distribution contributed to narrowing the gap between households at the top and those at the bottom. Thus, access improved for the bottom six deciles but declined slightly for the top four deciles. However, the data reveals an important difference in the type of piped water connection across the income

distribution: poorer households are considerably less likely to have piped water within their dwellings compared to richer households. Similarly, the likelihood that households pay for water services also rises with income and is higher for households in urban or commercial agricultural areas.

FIGURE 37. Household access to piped water on-site by income decile, 2011 and 2023



Source: Own calculations, General Household Survey (2011, 2023).

Notes: Income categories are derived from the imputed household income variable as described in Box 1. The categories represent shares of households ranked from poorest to richest each year. Piped water on site includes both piped water in the dwelling and piped water available on site.

Figure 38 indicates that household income and geographic location are positively correlated with access to sanitation. Higher-income households in urban settings are more likely to have access to a flush toilet, a pattern that holds across different regions, although the differences are particularly stark in commercial agricultural areas. While 97.1 per cent of urban quintile five households have access to a flush toilet compared to 77.6 per cent of their quintile one counterparts, the figures in traditional rural areas are 43.3 per cent and 5.4 per cent, respectively. In commercial agricultural areas, 91.6 per cent of quintile five households have access to flush toilets, while this is true for less than one-quarter (21.5 per cent) of quintile one households.

0.8 0.7 0.2 0.2 0.8 2.6 100.0 1.7 1.3 8.2 1.9 2.0 1.0 0.6 0.4 4.3 1.6 2.3 1.3 1.2 0.3 6.3 7.6 1.7 2.5 1.1 5.8 2.1 3.1 16.1 1.3 12.7 14.6 17.0  $\frac{1.7}{2.2}$ 80.0 28.5 Share of households (%) 56.7 71.8 60.0 63.4 40.6 83.4 66.6 90.7 91.2 97.1 91.6 88.5 84.0 81.7 40.0 77.6 59.8 43.3 20.0 39.5 28.3 27.8 21.5 14.9 7.5 0.0 Q1 Q2 Q3 Q4 Q1 Q2 Q3 Q4 Q1 Q2 Q3 Q4 Q5 Urban **Traditional Farms** Flush Pit Bucket Other None

FIGURE 38. Type of toilet by income quintile and location, 2023

Source: Own calculations, General Household Survey (2011, 2023).

Notes: Income categories are derived from the imputed household income variable as described in Box 1. The categories represent shares of households ranked from poorest to richest in each year. Flush toilets include those connected to a public sewerage system, septic tank, conservancy tank, or pour bucket-flush toilets linked to a septic tank or seepage pit. Pit latrines encompass those with or without ventilation pipes, as well as those without slabs or open pits. Bucket toilets refer to all bucket toilets, whether collected by the municipality or emptied by the household.

Pit latrines are the predominant type of toilet in traditional rural areas, even among quintile five households, while in commercial agricultural areas, around two-thirds of households in quintiles one and two rely on pit latrines. Households without adequate sanitation may face additional healthcare costs due to increased exposure to waterborne diseases. Inadequate sanitation facilities can also negatively impact productivity and educational outcomes. The illnesses associated with poor-quality facilities may disrupt learning, lead to absenteeism, and ultimately hinder educational attainment.

### 5.3.3. ELECTRICITY

Between 2011 and 2023, household access to electricity improved nationally (Table 10): the proportion of households with electricity access increased from 83.6 per cent in 2011 to 94.5 per cent in 2023, a rise of 13.0 per cent or almost 11 percentage points. This expansion has been driven by strong gains in rural areas (+26.1 per cent), among African-headed households (+16.9 per cent), among poor households (+18.0 per cent), and among households residing in informal dwellings (+17.0 per cent). By 2023, therefore, access rates for all categories of households were above 90 per cent, with the only exceptions being households in informal dwellings (81.8 per cent) and rural households (80.8 per cent).

TABLE 10. Household access to electricity, 2011-2023

	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	%
National average	83,6	89,0	89,9	92,0	91,9	93,1	94,0	95,0	93,6	94,7	94,4	94,6	94,5	13,0
Formal	86,6	92,3	92,5	94,2	94,1	94,7	95,4	96,0	94,1	94,5	94,4	94,7	94,5	9,1
Informal	69,9	76,4	81,4	79,9	78,5	80,5	79,7	81,4	78,6	86,1	83,7	81,5	81,8	17,0
Urban	86,4	92,0	92,3	94,1	94,0	94,7	95,3	95,9	94,0	94,5	94,3	94,6	94,4	9,3
Rural	64,1	72,0	76,5	77,6	73,3	77,9	77,5	79,9	76,7	82,0	82,7	81,6	80,8	26,1
African	80,1	86,2	87,4	90,1	90,1	91,6	92,8	94,1	92,4	93,7	93,4	93,7	93,6	16,9
Coloured	89,9	97,7	97,8	98,0	98,0	98,2	98,2	98,3	97,8	98,3	98,3	98,1	97,9	8,9
Asian	98,8	99,4	99,5	99,6	100,0	99,4	99,8	99,1	97,4	100,0	98,0	98,9	99,6	0,8
White	99,8	99,9	99,9	99,9	99,9	99,8	99,8	99,9	99,9	99,9	100,0	99,5	99,6	-0,2
Male HH head	82,6	89,0	89,7	91,8	91,6	92,6	93,6	94,4	92,6	93,5	93,8	93,5	93,2	12,8
Female HH head	85,0	89,0	90,2	92,2	92,4	94,0	94,6	95,9	95,1	96,3	95,3	96,2	96,2	13,2
Poorest decile	78,9	81,3	84,7	88,4	88,6	94,8	90,9	94,8	89,6	91,9	92,6	93,0	91,9	16,5
HH below upper bound poverty line	79,1	83,8	85,4	88,1	88,6	91,8	91,6	93,9	91,5	92,8	92,6	92,7	93,3	18,0
HH above upper bound poverty line	86,5	90,3	91,2	93,2	93,3	94,4	95,4	96,1	95,6	95,6	95,9	96,5	96,3	11,3
Richest decile	99,2	99,8	99,4	99,9	99,3	99,2	99,5	98,5	99,1	100,0	99,6	99,3	99,3	0,1
HH w/o child	80,5	88,1	89,4	91,3	90,7	91,8	93,0	94,0	91,6	93,8	93,0	93,1	92,8	15,3
HH with child	86,2	89,8	90,2	92,5	93,0	94,4	95,0	96,0	95,5	95,4	95,6	96,1	96,1	11,5
low													high	

Sources: Own calculations, GHS (2011-2023).

Notes: Heatmap table values represent the share of households that have access to electricity. The final per cent (%) column represents the percentage change between 2011 and 2023. Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year.

Electricity disruptions drive up the cost of living. Electricity is a key input in many processes, and a lack of access impacts daily life and economic activities. Reduced electricity access results in decreased productivity and lower incomes. Households from lower socioeconomic backgrounds are more vulnerable to electricity supply interruptions, as they are less likely to have the financial resources to cope with extended power outages or afford alternative energy sources. For instance, the poor are less likely to afford backup power sources such as uninterruptible power supplies (UPS) and are less able to prevent damages from load shedding, have insurance, or replace equipment damaged by load shedding (Inglesi-Lotz, 2023). In other words, quality issues in service delivery exacerbate energy insecurity and deepen existing social inequalities.

### 5.3.4. REFUSE REMOVAL

As with other services, the likelihood of refuse being removed is positively correlated with per capita household income (Figure 39). In 2023, 86.5 per cent of households in the top quintile reported that their refuse is removed, compared to only two-thirds (66.5 per cent) of the middle 40 per cent of households and less than half (46.7 per cent) of the poorest 40 per cent. However, there has been no discernible trend—either improvement or deterioration—in access to refuse removal over the period.



FIGURE 39. Refuse removal by income category, 2011-2023

Source: Own calculations, General Household Survey (2011, 2015, 2019, 2023).

Notes: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. Rubbish is considered to be removed irrespective of who removed it.

Shares may not add to 100 due to the omission of the 'Unspecified' category.

Insufficient rubbish removal can perpetuate environmental and health inequalities and raise the cost of living through several channels: (i) solid waste pollution increases fire risk, potentially leading to property loss (Schmitz, 2018); (ii) inadequate rubbish removal can result in health issues such as disease transmission, respiratory disorders, and other concerns, especially in informal settlements (Schmitz, 2018); (iii) waste can contaminate water supplies, raising the risk of stunting in young children (Soe et al., 2023); (iv) waste attracts pests, which pose additional health hazards and force households to incur extra pest control expenses (Schmidt, 2008); (v) unhygienic conditions deter customers, negatively impacting businesses and reducing livelihoods (Barber et al., 2011; Vilnai-Yavetz and Gilboa, 2010); and (vi) illegal dumpsites may be linked to crime (Massa et al., 2023).

### 5.3.5. COMMUNICATIONS

Table 4.3 shows a decline in landline access nationally between 2011 and 2023, from 15.3 per cent of households to 5.0 per cent. This decline was consistent across all household characteristics. Higher per capita income is associated with greater access. However, the overall decline in landline access is not surprising given the high rates of access to cellular telephones. In fact, access to cellular telephones is nearly universal, having increased steadily from 90.6 per cent in 2011 to 96.2 per cent in 2023. This suggests that telephones have been substituted for cellphones and that access to mobile communication is a necessary part of daily life, regardless of income level.

TABLE 11. Household access to communication technologies, 2011-2023

	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	
Telephone	15.3	14.3	13.2	12.9	11.1	9.6	8.4	7.1	8.3	8.8	7.0	7.2	5.0	-67.3
Cellphone	90.6	93.4	94.9	95.7	96.5	96.5	96.4	96.6	96.1	97.7	97.3	95.8	96.2	6.2
low													high	

Sources: Own calculations, GHS (2011-2023).

Note: Darker values indicate a higher value. The final column represents the percentage change between 2011 and 2023.

National levels of home internet access grew steadily from 10.2 per cent to 14.5 per cent between 2011 and 2023 (Table 12). Similar to other utilities, the share of internet access correlates with household income levels: the top 10 per cent of households have access rates more than three times the national average (53.1 per cent compared to 14.5 per cent), whereas the access rate for the poorest decile is 6.8 per cent, less than half the national average. Further investigation of the data suggests a significant digital divide for internet access across household head demographics and gender groups in 2023: White-headed households have higher levels of internet access (67.2 per cent) compared to those with Asian (39.7 per cent), Coloured (34.0 per cent), and African heads (7.4 per cent).

TABLE 12. Household internet access, 2011-2023

	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	%
National average	10,2	10,0	10,3	11,1	9,9	9,8	10,6	10,4	9,1	8,3	10,4	13,0	14,5	42,2
Formal	12,9	13,0	13,1	13,7	12,5	12,2	13,1	12,7	11,0	9,8	12,4	15,4	17,1	32,6
Informal	0,4	0,4	0,6	0,8	0,7	0,5	0,7	0,8	0,5	0,6	0,0	0,6	1,8	350,0
Poorest decile	4,9	4,8	7,8	5,2	9,8	17,3	5,5	20,3	4,6	4,8	3,3	5,9	6,8	38,8
HH below upper bound poverty line	1,7	1,8	2,7	2,6	3,7	6,3	2,1	6,5	1,9	2,1	1,4	2,5	3,3	94,1
HH above upper bound poverty line	10,4	10,1	10,3	11,4	10,0	9,6	10,7	10,2	9,1	7,9	10,8	13,8	15,9	52,9
Richest decile	49,4	49,5	46,8	49,4	43,1	38,4	49,4	31,7	41,9	40,7	45,5	55,1	55,6	12,6
HH w/o child	12,3	11,9	12,1	12,7	11,3	11,4	12,5	12,1	11,0	10,8	12,0	14,6	15,3	24,4
HH with child	8,4	8,4	8,7	9,6	8,6	8,2	8,7	8,8	7,5	6,4	8,9	11,4	13,7	63,1
Metro	16,4	16,8	16,8	18,1	16,3	15,6	17,6	17,3	15,4	14,0	17,2	21,4	23,8	45,1
low													high	

Sources: Own calculations, GHS (2011-2023).

Notes: Heatmap table values represent the share of households with internet access at home. The final percentage (%) column indicates the change between 2011 and 2023. Income categories are derived from the imputed household income variable as described in Box 1. These categories represent the shares of households ranked from poorest to richest in each year.

Households without internet access face additional costs when accessing services that increasingly rely on digital platforms, such as banking, education, and job opportunities. This results in higher expenses for lower-income households to obtain these services. Similarly, a lack of internet connectivity limits options for digital entrepreneurship that generates revenue through remote employment.

### 5.3.6. TRANSPORT

Transport accessibility depends on the mode of transport. Moreover, the location of housing influences transport availability, accessibility, and affordability. Historical urban planning in South Africa focused on private interests and spatial segregation, leading to urban sprawl and a lack of urban density and connectivity. Sprawl hinders the development of an effective public transportation system and implies that people cannot reduce transportation costs by walking or cycling (McKay, 2020). A key legacy of apartheid is that poor households often reside in peripheral areas with limited transport options and poor access to social amenities (such as education and healthcare) (Venter et al., 2007).

Transport time burdens disproportionately impact the poor, who often have limited transportation options and face significant constraints on their resources. For the poorest and lowest-income households, who depend more on public transportation, sprawl results in higher inefficiency and opportunity costs in terms of time lost due to unreliable and longer commute times. Moselakgomo et al. (2017) show that Gauteng city region township dwellers faced stagnant long commuting distances between 2001 and 2013. Time spent commuting could otherwise be allocated to income-generating activities, education, or personal development.

Urban sprawl and increased vehicle emissions can lead to long-term sustainability issues, affecting quality of life and living costs over time. Inadequate public transportation compels many urban residents to depend on private motor vehicles or mini-bus taxis, leading to higher transportation costs (relative to other forms of transport), which contributes to increasing the cost of living. Private vehicles also create negative externalities as they contribute to traffic congestion and air pollution, potentially leading to additional healthcare expenses<sup>6</sup>.

The transportation cost burden is influenced by the prices and usage patterns of different transport options. LCS 2014/15 (Stats SA, 2017) data indicates that household transportation expenditure amounts to between 10.7 per cent and 19.6 per cent of total expenditure (averaging 16.3 per cent). For all households, this constitutes the second or third largest expense. Many South Africans spend a significant portion of their income on transport, leading to "transport poverty", where individuals either cannot afford transportation or must reallocate funds from other essential needs. The LCS data also reveals that individuals with the following characteristics tend to spend more on passenger transport: Africans, females, and those from urban informal and traditional areas spend more on public or passenger transport, while whites, males, and those from urban formal areas tend to spend more on personal transport (motor vehicles and fuels).

Analysis of NHTS data shows that 30.8 per cent of households in 2020 cite travel costs as a key factor in choosing their travel mode, up from 26.1 per cent in 2013. In contrast, travel time, which was the most important factor in 2013 at 32.6 per cent, has dropped to 23.3 per cent in 2020 (Stats SA, 2020). Moreover, a growing share of households are using taxis as their main mode of travel.

### 5.3.7. WORK-RELATED TRAVEL PATTERNS

Figure 40 compares the average trip duration and monthly cost for work-related travel across transport modes in 2013 and 2020. Travel time for all public modes of transport (train, taxi, and bus) increased over this period; these modes were also associated with the longest transport times. In December 2023, monthly costs in Rands for train and taxi increased by R57 and R248 respectively, while costs for bus transport fell by R36. Given their heavy reliance on taxis, this suggests upward pressure on the cost of living for poorer households. In contrast to train and taxi costs, average monthly costs for private transport modes became cheaper in real terms, falling by R334 for drivers and R622 for passengers.

120 2,000 110 100 90 1,500 Rands per month Minutes per trip 80 70 60 1,000 50 40 30 500 20 10 0 Train Taxi Car/truck Car/truck Walking all Bus (driver) (passenger) the way Time (2013) Time (2020) Cost (real) Cost (real)

FIGURE 40. Average time spent travelling to work and average cost per month by mode of transport, 2013 and 2020

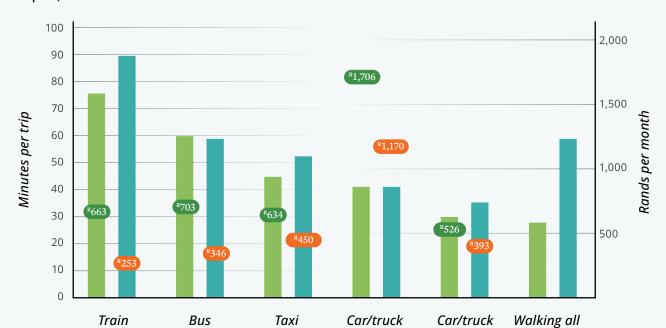
Source: Own calculations, NHTS (2013, 2020), Statistics South Africa (2024a).

Notes: All rand values are expressed in real terms, adjusted for inflation, as of December 2023. Work-related travel patterns are for people aged 15 years and older.

The NHTS (2020) data suggests that walking is often a choice (47.2 per cent), due to unaffordable or unavailable public transport (22.9 per cent), or because work is nearby (16.5 per cent). However, in rural areas, most workers walk to work primarily due to proximity (Stats SA, 2022:72). In contrast, urban workers tend to walk to work by choice.

#### 5.3.8. EDUCATION-RELATED TRAVEL PATTERNS

This section explores the travel patterns of scholars and the financial burden associated with them. The travel times to educational institutions, as shown in Figure 41, are similar to those for work purposes. However, there are notable differences in monthly costs for public transportation, which tends to be less expensive for school travel. This may be because educational institutions—especially schools—are often more conveniently located. This is somewhat supported by the shorter duration of car or truck travel, whether as a driver or passenger, for education compared to work. The majority of car/truck driver trips were to higher education institutions and TVET colleges, while car/truck passengers were 1.5 times more likely to be travelling to pre-school or school.



(driver)

Cost (real)

the way

Cost (real)

(passenger)

FIGURE 41. Average time spent travelling to educational institution and average cost per month by mode of transport, 2013 and 2020

Source: Own calculations, NHTS (2013, 2020), Statistics South Africa (2024a).

Time (2013)

Notes: All rand values are expressed in real terms, adjusted for inflation, as of December 2023.

Time (2020)

Between 2013 and 2020, travel time to educational institutions increased for those using trains, taxis, and cars/trucks (as passengers). As with work travel, public transport modes exhibited the longest travel times. However, real monthly costs decreased for all modes over the seven-year period. In December 2023 Rands, the monthly school-related costs of train, bus, and taxi travel fell by R410, R357, and R184 respectively, suggesting that the cost of living decreased for poorer households, who are more likely to rely on public transport. Costs for private transport modes also fell, by R536 and R133 for car/truck drivers and car/truck passengers respectively.

#### 5.3.9. EDUCATION

Education is a key driver of socioeconomic development. The NDP emphasises that accessible, quality education equips citizens with the skills and knowledge needed for productive economic participation, ultimately reducing poverty and inequality (National Planning Commission, 2012). Through education, individuals can break the cycles of poverty, access better-paying jobs, and improve their socioeconomic standing (Harper et al., 2003). In turn, this enhances housing and food security, as educated individuals are more likely to have stable incomes and effective financial management skills<sup>7</sup>. Education is also linked to better health outcomes (Ross and Wu, 1995) and fosters intergenerational mobility<sup>8</sup>.

Significant barriers to educational access, particularly for disadvantaged communities, hinder the realisation of this right. Inflation trends in educational costs have surged beyond other inflationary components. The high costs of quality education make it increasingly inaccessible for many and exacerbate existing inequalities. Moreover, the LCS 2014/2015 indicates that, on average, education costs represent 2.5 per cent of total household expenditure, with the share being below one per cent for the poorest 40 per cent of households. This highlights both the need for no-fee schools and the impact of this policy intervention on household expenditure patterns.

#### 5.3.10. EARLY CHILDHOOD DEVELOPMENT

The development of human capital and future academic success are directly correlated with early childhood development (ECD). Due to the entrenchment of socioeconomic inequality caused by the apartheid legacy in South Africa, many children cannot access high-quality early childhood development programmes (Ashley-Cooper et al., 2019). Figure 42 presents the types of ECD facilities attended by children under seven years old across the income distribution between 2017 and 2023. Over this period, children from higher-income households were more likely to attend a formal ECD facility (crèche or educare centre, preschool or grade 00 or 000, or grade R or higher) than those from lower-income households. In 2023, 52.5 per cent of children in the poorest 40 per cent of households did not attend any type of ECD programme, compared to 36.9 per cent in the middle 40 per cent of households and 21.5 per cent in the top 20 per cent. Attendance at crèche/educare centres and grade R or higher were at similar levels for children in the middle 40 per cent and top 20 per cent of households; however, for children in the poorest 40 per cent of households, 26.6 per cent attended grade R or higher, while 15.4 per cent attended a crèche or educare centre.

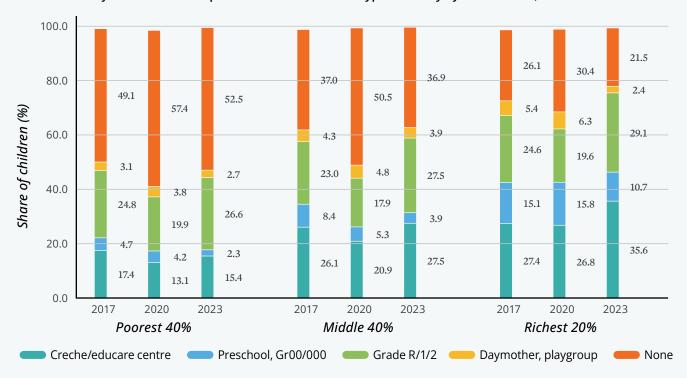


FIGURE 42. Early childhood development attendance across type of facility by income level, 2014-2023

Source: Own calculations, GHS (2017, 2020, 2023).

Notes: Income categories are derived from the imputed household income variable described in Box 1. The categories represent shares of households ranked from poorest to richest for each year. The 'other' category is omitted from the figure. The data reflect attendance at Early Childhood Development (ECD) facilities among household members aged 0-6 years. Data for 2011 and 2014 were not coded compatibly and are excluded here.

Higher costs for ECD have reinforced existing inequalities, widening the gap between socio-economic groups. Children from lower-income households are more likely to miss out on the foundational benefits of structured early education. Children from households in the richest quintile are 70 per cent and 28 per cent more likely to attend a formal ECD facility than those from the poorest 40 per cent and middle 40 per cent of households, respectively. This reinforces barriers to social mobility and other inequities, as deficits accumulated by poorer children may have long-lasting impacts on their cognitive, social, and economic outcomes throughout their lives.

ECD attendance typically incurs costs for households. Figure 43 presents the monthly costs paid by households for children attending ECD across the income distribution. Fees are charged for most children who attend crèche or educare centres, regardless of their household income, with only 6.6 per cent of children paying no fees at these institutions in 2023. In contrast, in the poorest 40 per cent of households,

three-quarters (73.2 per cent) of children attending Grade R/1/2 pay no fees, as do 44.8 per cent of children in the middle 40 per cent. For preschools and grades 00/000, 30.5 per cent of children in the poorest 40 per cent of households and 8.1 per cent of those in the middle 40 per cent pay no fees.

Creche/educare centre Preschool, Gr00/000 Grade R/1/2 100.0 1.9 5.4 1.5 1.7 7.5 2.9 6.1 8.7 16.7 8.8 9.3 20.8 80.0 10.8 44.5 11.9 50.3 21.6 Share of learners (%) 60.4 17.1 60.0 57.8 26.5 84.2 26.3 40.0 24.0 73.2 62.4 47.3 29.0 44.8 12.3 20.0 16.7 30.5 11.0 8.3 10.1 Richest 20% Poorest 40% Middle 40% Poorest 40% Middle 40% Poorest 40% Middle 40% Richest 20% Richest 20% R1,001°-R2,000 None R1-R500 R501-R1,000 R2,001+

FIGURE 43. Fees paid for early childhood development attendance by type of facility and income group, 2023

Source: Own calculations, GHS (2023).

Notes: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. The data reflect ECD fees for household members aged 0-6 years.

Among those who pay fees, there is a clear gradient, with children from higher-income households typically paying higher fees. For children in the top 20 per cent of households, more than two-fifths of those attending grade R/1/2 and three-fifths of those attending preschool pay fees exceeding R2,000 per month. In contrast, fees are generally much lower for children from poorer households—90.4 per cent of children in the poorest households pay up to R500 per month for crèche or educare centres—yet there are still relatively large numbers of households paying significantly higher fees. For example, 8.7 per cent of children in the poorest 40 per cent of households pay R501-R1,000 per month to attend preschool, while 3.5 per cent pay more than R1,000 per month for crèche or educare centres. For these households, these represent significant costs that are likely to strain budgets.

#### 5.3.11. SCHOOL EDUCATION

In South Africa, the enduring legacy of apartheid continues to shape educational outcomes, with poorer learners—predominantly from previously disadvantaged communities—performing worse academically due to entrenched systemic inequalities and limited access to quality education (Spaull, 2015). Figure 44 presents the shares of learners attending school based on whether they report paying school fees and, if they do not, the reason for not paying fees between 2011 and 2023. Learners from wealthier households are more likely to report paying school fees than their counterparts from poorer quintiles. In 2023, 87.2 per cent of school learners in quintile five reported paying school fees, compared to 32.2 per cent in quintile three and just 18.4 per cent in quintile one. The main reason for not paying school fees is that

learners are attending no-fee schools. Thus, between three-quarters and four-fifths of learners from quintile one and two households did not pay fees because they were attending a no-fee school in 2023 (79.9 per cent and 75.5 per cent of learners in these quintiles respectively), while the same held true for two-thirds (66.1 per cent of quintile three learners).

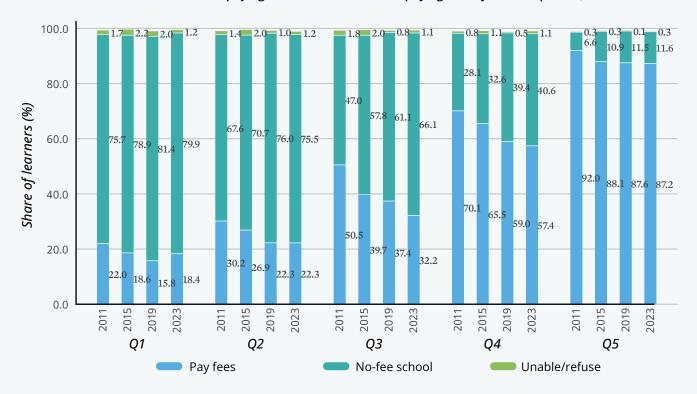


FIGURE 44. Share of school learners paying fees and reason for not paying fees by income quintile, 2011-2023

Source: Own calculations, GHS (2011, 2015, 2019, 2023).

Note: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. 'Other' category omitted from the figure. Figure only includes individuals who report attending a school, irrespective of age.

Regardless of income level, the proportion of school learners reporting payment of school fees declined over the period. While education inflation has been relatively high, this decline has not been matched by an increase in the percentage of learners stating they are unable or unwilling to pay fees. Instead, there has been an increase in the proportion citing attendance at a no-fee school as the reason for not paying. The increase has been marginal for learners in quintile one households (4.2 percentage points), but larger for those in the middle quintiles: 7.9 percentage points for quintile two learners, 19.1 percentage points for quintile three learners, and 12.5 percentage points for quintile four learners. In 2023, 11.6 per cent of quintile five school learners reported not paying fees due to attending a no-fee school, up from 6.6 per cent in 2011.

Figure 45 illustrates the distribution of school fee payments for learners by household income quintile in 2023. There is a clear positive correlation between income level and ability to pay for education: 42.3 per cent of learners from the richest quintile report paying school fees of more than R12,000 per year, whereas only 2.5 per cent of learners in quintile three and 0.5 per cent in the poorest quintile do the same. In fact, 81.6 per cent of learners from the poorest quintile report paying no school fees. With roughly 13 per cent of learners in the bottom three quintiles reporting annual school fees of up to R500, this means that 90 to 95 per cent of learners in the bottom two quintiles pay no more than R500 per annum in fees. This is also true for 80.3 per cent of learners in quintile three, 53.1 per cent in quintile four, and just 16.1 per cent in quintile five.

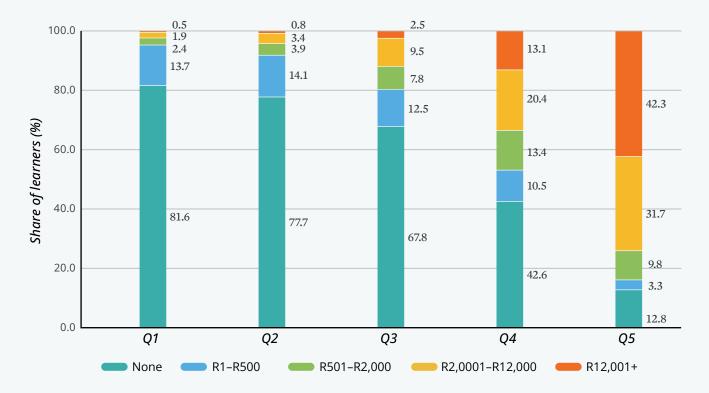


FIGURE 45. School fees paid for learners by income quintiles, 2023

Source: Own calculations, GHS (2023).

Note: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. Figure only includes individuals who report attending a school, irrespective of age.

Besides the fee barriers, children in poorer households are often located far from the schools that wealthier children attend, leading to additional transport costs that further limit access. Moreover, there are differences in the quality of fee-paying and no-fee schools. Although no-fee schools receive more public funding, fee-paying schools generally maintain smaller class sizes by employing more teachers, resulting in a better student-to-teacher ratio (Maistry and Africa, 2020). Fee-paying schools also typically offer superior resources, facilities, and extracurricular opportunities, which enhance educational outcomes. Consequently, children from wealthier backgrounds benefit from better-funded educational opportunities, reinforcing a cycle of privilege, while poorer learners remain trapped in a cycle of disadvantage.

#### **5.3.12. POST-SECONDARY EDUCATION**

In the South African labour market, higher levels of education are highly valued. Individuals with tertiary qualifications have better employment prospects, resulting in substantial earnings benefits (Branson and Leibbrandt, 2013). However, higher education institutions face pressure to balance affordability with quality education. This was highlighted by the recent student funding crisis, which led to university closures in 2015 and 2016 (Allais, 2019). South African households increasingly recognise the importance of tertiary education but are not necessarily able to afford it.

Figure 46 presents the distribution of post-secondary education attendees across household income quintiles between 2011 and 2023. The unequal access to the post-secondary education system based on socioeconomic status is evident from the figure. In 2023, students from the richest 20 per cent of households accounted for 31.4 per cent of those attending a post-secondary institution, while 21.1 per cent were from quintile four; the poorest 60 per cent of households made up just 47.5 per cent

of students. However, access to post-secondary education for students from poorer households has steadily increased from 2011 to 2023. The share of students from the poorest quintile rose from 8.7 per cent in 2011 to 13.6 per cent in 2023, while for quintile two, the proportion increased from 8.6 per cent to 16.4 per cent.

100.0 28.8 31.4 35.0 80.0 39.9 Share of learners (%) 60.0 23.7 21.1 22.6 25.8 40.0 17.4 18.3 14.3 17.0 16.4 13.6 20.0 17.0 8.6 14.5 13.6 12.3 8.7 0.0 2011 2015 2019 2023 Quintile 3 Quintile 1 Quintile 2 Quintile 4 Quintile 5

FIGURE 46. Composition of post-secondary education attendees by income quintile, 2011-2023

Source: Own calculations, GHS (2011, 2015, 2019, 2023).

Note: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. Figure includes individuals who report attending a higher education institution (university or university of technology), a further education and training (FET) college, or other college.

The 2023 distribution of tuition fees paid by students in post-secondary education across household income quintiles is shown in Figure 47. Households typically pay significant amounts for members to attend post-secondary education, although the data suggests a degree of progressivity, with students from better-off households often paying more than those from poorer households. In 2023, only 5.0 per cent of quintile five students reported paying no tuition fees at all. This is half the proportion for quintile four students (11.5 per cent) and one-quarter to one-seventh of the proportions in the bottom three quintiles. In contrast, one in three quintile five students reports paying fees of R20 001-R40 000 per annum, compared to between 10 per cent and 14 per cent of students in the poorest three quintiles, with similar patterns observed for the higher fee ranges. As a result, around 21-38 per cent of students in the bottom four quintiles pay more than R20 000 per year in fees for post-secondary education; this is true for more than three out of five students (61.2 per cent) in the top quintile. This apparent progressivity is likely the combined result of several factors, including greater access for poorer students to financial assistance for post-secondary education, differences in the distribution of students from each quintile across institution types (university, FET college, other college), and the ability of students from wealthier quintiles to choose relatively more expensive institutions.

100.0 2.5 3.9 4.1 3.1 9.2 6.7 11.9 12.8 12.9 10.2 80.0 19.6 13.3 10.4 21.1 20.5 Share of students (%) 18.7 60.0 19.8 32.4 18.7 24.2 17.8 6.9 40.0 8 1 5.1 21.8 8.3 3.6 20.5 3.2 20.0 7.1 33.2 27.1 98 2.8 22.9 2.6 0.8 11.5 0.0 Q1 Q4 Q5 Q2 Q3 R4,001-R12,000 None R1-R2 000 R2,001-R4,000 R12,001-R20,000 R20,001-R40,000 R40,001-R80,000 R80,001+

FIGURE 47. Tuition fees paid per student for post-secondary education by income quintile, 2023

Source: Own calculations, GHS (2023).

Note: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. Figure includes individuals who report attending a higher education institution (university or university of technology), a further education and training (FET) college, or other college.

Finally, it is important to note that academic success is not guaranteed by access alone. Financial limitations remain a significant obstacle despite advancements in access to higher education. Letseka and Maile (2008) found that 70% of the families of university dropouts are classified as having a "low economic status." Moreover, socioeconomic status influences the relationship between dropout intention and academic adjustment (Mtshweni, 2021). Financial constraints can therefore hinder academic performance, which in turn limits career opportunities and earnings.

#### 5.3.13. HEALTH AND SOCIAL DEVELOPMENT

According to data from the LCS 2014/15 (Stats SA, 2017), health-related expenditure averages 0.9 per cent of household expenditure across all deciles, ranging from 0.8 per cent to 1.0 per cent. In this section, we examine the use of healthcare facilities and medical aid membership, as well as the prevalence of chronic conditions and disabilities to understand long-term health costs.

#### **5.3.14. CHOICE OF HEALTHCARE PROVIDER**

Health inequalities persist in post-apartheid South Africa, with socioeconomic status determining access to healthcare and health outcomes (Omotoso & Koch, 2018b). The public healthcare system is failing to meet expectations, causing gaps to widen and poor health outcomes to persist despite attempts at quality improvement (Maphumulo and Bhengu, 2019).

The General Household Surveys ask respondents about the type of healthcare provider they would usually consult first when a household member becomes ill, and Figure 48 presents their responses according to household income. The greater access to private healthcare enjoyed by higher-income households is evident: 85.1 per cent of households in the highest income decile opt for private healthcare, whereas between 90 per cent and 98 per cent of households in the poorest four deciles report first consulting public institutions. Pharmacies are the first port of call for less than two per cent of households, with higher-income households slightly more likely than those at the lower end of the income distribution to choose them.

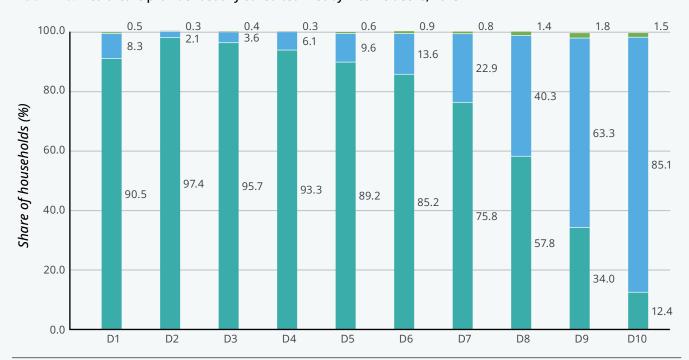


FIGURE 48. Healthcare provider usually consulted first by income decile, 2023

Source: Own calculations, GHS (2023).

Note: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. Public sector includes public hospital, clinic or other public sector provider; and private sector includes private hospital, clinic, doctor/specialist, or other private sector provider. Other providers not plotted here include traditional/spiritual healers, health facility provided by employer, and alternative medicine.

In comparison to 2011, the 2023 results suggest that a growing share of households are relying on public facilities as their first choice. One reason for this is likely the high cost of private healthcare, which is often unaffordable for vulnerable populations (Harris et al., 2011). Rural populations face a double burden in accessing healthcare, first overcoming financial, transportation, and distance barriers to reach a facility, only to often encounter poor-quality services, ultimately exacerbating health inequities compared to urban areas (Gaede and Versteeg, 2011).

#### 5.3.15. MEDICAL AID

In the South African context, medical aid coverage is critical for providing households with access to private healthcare, which is generally considered to be of better quality than the care available in the public sector. However, due to high levels of unemployment, inequality, and poverty, medical aids are unaffordable for many households. As the cost of living rises, people cannot afford medical aid, leading to higher out-of-pocket expenses and increased vulnerability to unexpected costs. Figure 49 presents the proportion of the population covered by medical aid schemes between 2011 and 2023. According to the data, the coverage rate has declined over this period, which may partly explain the decrease in the proportion of households choosing private healthcare facilities when members require medical attention.

Less than four per cent of the population in the poorest 40 per cent of households have access to medical aids, with the coverage rate in 2023 estimated at just 2.1 per cent. Coverage rates for the middle 40 per cent of households ranged in the upper teens over this period but fell to 15.1 per cent in 2023. In contrast, almost two-thirds (63.4 per cent) of the population in the top quintile have coverage, although this is 3.3 percentage points lower than in 2011. This may reflect the increasing cost of medical aid membership, as well as weak formal sector employment growth during this period.

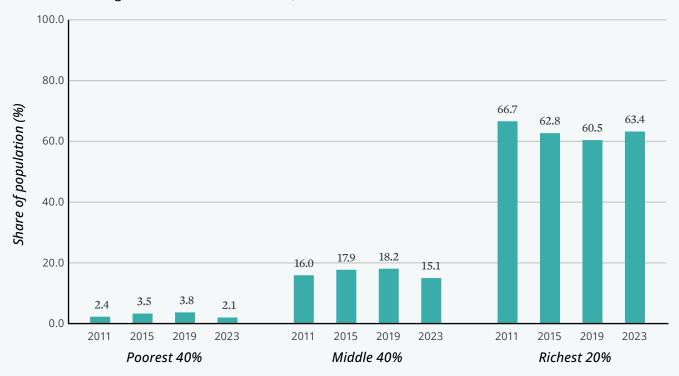


FIGURE 49. Coverage rate of medical aid schemes, 2011-2023

Source: Own calculations, GHS (2011, 2015, 2019, 2023).

Note: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year.

The higher a household's income, the more likely it is to have medical aid coverage. Consistent with this pattern, the GHS data reveals higher coverage rates for Whites and Asians compared to Coloureds and Africans, as well as low coverage rates similar to those of the poorest 40 per cent of households among the working poor. These findings highlight the persistent inequities in access to healthcare in South Africa, which ultimately exacerbate the cost of living for already vulnerable populations. Due to the stark differences in coverage rates, higher income groups represent a large proportion of medical aid members. In 2023, for example, the top decile accounted for 32.9 per cent of medical aid members, but just 6.9 per cent of the country's population. Three-quarters (75.5 per cent) of medical aid members come from the top three deciles, which together represent just 22.7 per cent of the population.

#### 5.3.16. FOOD SECURITY

According to the LCS 2014/15 (Stats SA, 2017), the average expenditure on food represents 12.9 per cent of total household expenditure. However, household food expenditures are regressive, meaning that poor households devote a larger proportion of their expenditures to food than higher-income households. For all households below the median, approximately 30 per cent of expenditure is on food and beverages. In contrast, this figure was 5.8 per cent for the richest decile of households. Furthermore, above-inflation increases in food prices between 2011 and 2023 have made food less affordable, raising the cost of living. As a result, poorer households are more vulnerable to food price changes and face greater exposure to fluctuations in food costs than their wealthier counterparts.

Table 13 shows that between 2011 and 2023, the average share of households reporting insufficient food, at least some of the time, for adults and children has grown across all income levels. The lower the per capita income of a household, the higher the likelihood of being food insecure. The poorest 40 per cent of households experience the highest levels of hunger, with about one in three adults affected. The data also indicates that if the household is classified as working poor, then children are 1.4 times as likely, and adults are 1.5 times more likely to experience hunger. In terms of coping strategies, households are increasingly likely to report having less variety of food but, simultaneously, less likely to report running out of food, eating less food, or skipping meals.

TABLE 13. Food security by income category, 2011-2023

		2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	%
poo	poorest 40%	28,8	29,2	29,8	29,8	27,9	25,8	27,8	22,5	26,4	31,9	34,5	28,6	30,9	7,3
ıfficient fo for adults	next 40%	10,6	11,3	11,3	10,6	11,6	13,8	9,9	10,4	11,0	11,6	12,0	11,2	13,7	29,2
Insufficient food for adults	richest 20%	1,9	1,8	1,5	1,9	2,7	2,8	2,1	4,4	3,3	2,3	2,7	2,9	3,9	105,3
Inst	national av.	16,2	16,5	16,7	16,5	16,3	16,4	15,6	14,1	15,6	17,8	19,2	16,5	18,6	14,8
poo	poorest 40%	26,0	27,7	28,8	27,5	25,8	24,8	24,9	22,0	22,4	27,9	29,0	25,3	26,0	0,0
Insufficient food for children	next 40%	8,8	9,1	9,9	9,7	9,5	12,3	9,2	10,7	8,5	9,6	8,2	9,6	11,7	33,0
uffici or ch	richest 20%	1,2	1,5	1,9	3,0	4,4	3,3	4,1	2,9	3,2	1,8	1,4	2,7	2,9	141,7
lns	national av.	16,7	18,1	18,6	18,2	17,4	17,5	16,9	16,0	14,6	17,3	17,5	16,5	17,8	6,6
рос	poorest 40%	35,8	40,1	37,7	38,5	37,4	32,9	35,8	31,1	25,6	29,6	30,4	28,5	30,8	-14,0
Ran out of food	next 40%	15,6	27,9	15,5	15,1	16,2	19,5	15,0	16,9	10,2	11,0	10,3	10,0	12,6	-19,2
n out	richest 20%	5,1	14,3	3,2	3,8	4,6	5,1	5,1	8,1	2,5	2,4	0,8	1,9	2,9	-43,1
Ra	national av.	21,7	35,8	22,0	22,2	22,4	22,0	21,4	20,8	14,8	16,8	16,4	15,8	17,9	-17,5
pc	poorest 40%	32,8	33,1	34,9	34,1	33,6	29,8	32,5	27,6	26,5	32,2	33,4	29,0	33,3	1,5
Ate less food	next 40%	13,7	13,2	14,1	12,9	13,4	16,7	12,5	12,7	10,7	12,0	11,4	10,6	13,8	0,7
te le	richest 20%	4,4	2,8	3,3	4,6	4,6	4,3	4,3	6,2	2,8	2,8	1,4	2,0	3,3	-25,0
⋖	national av.	19,5	19,1	20,2	19,7	19,7	19,4	18,9	17,4	15,4	18,2	18,2	16,3	19,5	0,0
<u></u>	poorest 40%	28,7	29,0	29,5	28,5	28,1	25,2	26,6	22,3	22,8	27,6	27,7	24,6	28,2	-1,7
Skip a meal	next 40%	11,3	10,8	11,4	10,0	11,1	13,6	10,4	10,3	9,1	10,2	9,8	9,1	12,2	8,0
skip a	richest 20%	2,9	1,7	2,4	3,2	4,0	3,8	3,0	4,8	2,4	2,0	0,8	1,6	2,9	0,0
01	national av.	16,6	16,3	16,8	16,0	16,5	16,3	15,4	14,0	13,2	15,5	15,2	13,8	16,7	0,6
ety	poorest 40%	33,0	32,9	35,2	34,1	33,9	30,5	31,8	27,9	30,5	35,1	37,8	33,2	38,1	15,5
Lack of variety of food	next 40%	14,2	14,0	15,4	13,6	14,4	17,5	13,5	14,0	13,6	14,1	13,5	14,5	18,1	27,5
ck of	richest 20%	4,7	3,6	3,6	5,9	6,2	6,0	4,8	7,6	3,9	3,1	2,7	4,9	5,5	17,0
La	national av.	19,8	19,5	20,9	20,3	20,6	20,4	19,1	18,3	18,5	20,3	21,1	20,1	23,6	19,2
	low													high	

Sources: Own calculations, GHS (2011-2023).

Notes: Income categories derived from the imputed household income variable as described in Box 1. Categories represent shares of households ranked from poorest to richest in each year. Darker values indicate that larger shares of households had individuals who had insufficient food or employed a particular coping strategy in response to hunger due to financial constraints.

The results suggest a substitution effect where households—particularly those at the lower end of the income distribution—switch to lower-quality food. Misselhorn and Hendriks (2017) argue that unaffordable food drives individuals to choose cheaper, high-calorie options with low nutritional value, perpetuating a cycle of food insecurity, overweight, obesity, and child stunting. Food insecurity can lead to healthcare costs and further impact the cost of living and people's quality of life. Further investigation of the data indicates that household composition is less influential on food security, as coping strategies do not vary between households with and without children. Nevertheless, the high prevalence of child hunger underscores the importance of the school feeding programme.

### 5.4. Summary

The current housing landscape is characterised by socioeconomic inequalities and remnants of apartheid spatial planning. Between 2011 and 2023, there was a trend towards urbanisation and formal housing. The lack of affordable options led households to allocate a substantial portion of their income to housing costs. Housing disparities have widened. The wealthiest households continue to secure high-quality homes in well-serviced areas, while the poorest face increasing barriers to adequate housing. These factors have driven up the cost of living.

Access to basic services gradually improved, but the quality of those services has declined. Without access to alternatives, poor and working-poor households face more severe consequences from the decline in service quality. Frequent interruptions in water and electricity supply, inadequate water treatment, pollution, and unreliable refuse removal have compounded environmental degradation and health risks. Declines in service quality drive up household expenses, reduce housing affordability, and increase the cost of living.

Unequal asset ownership between income groups raises living expenses for lower-income households, restricting their abilities and opportunities. Households without basic durables, like refrigerators, must pay more every day for food and transportation. Households without time-saving appliances, such as washing machines, spend more time on chores, creating an opportunity cost where this time could be used more productively.

**Urban sprawl and inadequate public transport increase the cost of living.** Public transportation users have experienced longer wait times and higher costs, significantly impacting low-income households. In contrast, private transport costs have decreased. Historical urban planning raises transportation costs for the poor and reinforces their economic exclusion, ultimately making it harder to access jobs, healthcare, and education.

Access to education is hindered by rising educational costs. The gap in educational access has widened: the poorest households encounter barriers to both ECD and school education, with high fees and limited resources contributing to this disparity. Despite improved access to higher education for lower-income groups, financial barriers persist, reinforcing existing inequalities.

**More people rely on strained public healthcare facilities.** Medical aid coverage has declined marginally across all income levels. Medical aids are unaffordable for poorer households, leading to out-of-pocket expenses and broader health inequities. Chronic conditions and disabilities elevate the cost of living for affected households, with lower-income groups bearing a higher burden.

**Rising food prices between 2011 and 2023 have worsened food affordability, increasing the cost of living.** The prevalence of food insecurity is higher among poorer households. To cope, households may be forced to shift their consumption towards lower-quality, less nutritious food.



## 6. Conclusion

The analysis of trends in South Africa's cost of living from 2011 to 2023 reveals a complex landscape marked by both progress and challenges. The National Development Plan (NDP, 2012) emphasises the need to address poverty and inequality by reducing the cost of living, increasing access to affordable basic goods and services, and improving access to quality education and healthcare.

The government's efforts to provide basic services have shown some success with improved provision of water, electricity, sewerage, sanitation, and solid waste management. However, these achievements have been overshadowed by rising costs that have disproportionately affected poor and working-poor households.

#### This research set out to address six broad questions:

- 1. What are the trends in access to and costs of basic services (electricity, water, transport, education, health, and food) from 2011 to 2023, and how have these affected the cost of living for poor and working-poor households?
- 2. What factors have contributed to changing trends for households with employed members versus those with unemployed members over the same period?
- **3.** What are the impacts on households with children versus those without children, and what are the gender impacts?
- **4.** Have wages and other income (including social grants) increased in real terms for working people who receive low pay (working poor)?
- 5. What are the trends in income shares across the income distribution from 2011 to 2023?
- **6.** Has the cost of living for poor and working-class households reduced or increased over the decade under review (2011 to 2023)?

Addressing the first research question, the analysis shows that while access to basic services has generally improved, the costs associated with these services have risen significantly. The cost of basic utilities such as water and electricity, in particular, has outpaced inflation, placing a heavy burden on household budgets. At the same time, fewer households benefit from access to free basic services, disproportionately burdening poor households. Transportation and education costs have also increased, unduly affecting poorer households.

The second and third questions reveal stark similarities between households with employed members and those without, and substantial disparities between households with and without children. Households with at least one employed person have generally fared better in managing rising costs, but wage stagnation has limited their ability to keep pace with inflation. Households with children face additional pressures, particularly in education and travel expenses. An investigation of gender impacts at the household level is an avenue for further research.

Regarding the fourth question, the findings indicate that there has been a slight fall in real wages over the period. Where real wage growth has occurred, it has largely been confined to the lower half of the wage distribution. This may indicate that the effects of the national minimum wage are becoming more visible in this part of the wage distribution. Real wage growth for the top 40 per cent was either flat or declining over the period.

The fifth question on income share trends reveals persistent and, in some cases, widening inequality. Over time, for the poorest deciles, the share of wages in household income has declined, while grant income

has increased. This suggests a worsening of their labour market position. For the richer deciles, wages remain the dominant source of household income. Households in the bottom deciles have seen little improvement in their relative position.

In summary, while there have been some developments over the period that have supported poor households, these households continue to face significant pressures regarding the cost of living. Wage growth over the period was mainly confined to the lower half of the distribution, partly mitigating cost increases. However, wages remain under pressure and have not grown sufficiently to make a significant impact on poor households' living standards. While social assistance has expanded in terms of the number of grants paid, grants do not appear to have maintained their real value, especially given the expenditure patterns of poor households. The provision of free basic services is a key intervention aimed at insulating poor households from rising prices, but municipal data suggests that a declining number of households are receiving these free services.

These findings highlight the complex interplay between service provision, wage growth, and household well-being. While the government has made strides in expanding access to basic services, the benefits have been partially offset by rising costs and broader economic challenges. The period from 2011 to 2023 has been characterised by low economic growth, limited job creation, and general real wage stagnation, factors that have constrained the government's ability to effectively address cost of living pressures.

Looking forward, these findings underscore the need for a multifaceted approach to address cost of living issues. This should include targeted interventions to manage the costs of basic services or the provision of free basic services, and efforts to stimulate inclusive economic growth and job creation to adequately protect vulnerable households against rising living costs. Additionally, addressing the persistent inequalities in income distribution will be crucial for creating a more equitable and sustainable economic environment for all South Africans.



## 7. References

Allais, S., 2019. Towards measuring the economic value of higher education: Lessons from South Africa. In Unterhalter, E. (ed.). Measuring the Unmeasurable in Education. London, UK: Routledge. DOI: <a href="https://doi.org/10.4324/9780429444494">https://doi.org/10.4324/9780429444494</a>

Alvaredo, F., Atkinson, A. B., Piketty, T. and Saez, E., 2022. World inequality database (WID). Available: http://wid.world/data

Ashley-Cooper, M., van Niekerk, L-J. and Atmore, E., 2019. Early Childhood Development in South Africa: Inequality and Opportunity. In: Spaull, N. Jansen, J. (eds) South African Schooling: The Enigma of Inequality. Policy Implications of Research in Education, vol 10. Springer, Cham. DOI: https://doi.org/10.1007/978-3-030-18811-5\_5

Azomahou, T.T. and Yitbarek, E., 2020. Intergenerational mobility in education: Is Africa different? Contemporary Economic Policy, 39(3): 503-523. DOI: https://doi.org/10.1111/coep.12495

Barber, N., Goodman, R.J., and Goh, B.K., 2011. Restaurant Consumers Repeat Patronage: A Service Quality Perspective. International Journal of Hospitality Management, 30(2): 329-336. DOI: <a href="https://doi.org/10.1016/j.ijhm.2010.08.008">https://doi.org/10.1016/j.ijhm.2010.08.008</a>

Bhorat, H., Lilenstein, K., Oosthuizen, M. and Thornton, A., 2020. Wage polarization in a high-inequality emerging economy: The case of South Africa. WIDER Working Paper 2020/55. Helsinki: UNU-WIDER. Available: <a href="https://www.wider.unu.edu/sites/default/files/Publications/Working-paper/PDF/wp2020-55.pdf">https://www.wider.unu.edu/sites/default/files/Publications/Working-paper/PDF/wp2020-55.pdf</a> [Accessed 2024/07/23]

Bhorat, H., Hill, R., Köhler, T., Monnakgotla, J. and Steenkamp, F., 2023. Who are the Robots Coming For? The Evolving Task Content of Employment in South Africa. SARChI Industrial Development Working Paper Series WP 2023-06. SARChI Industrial Development, University of Johannesburg. Available: <a href="https://www.uj.ac.za/wp-content/uploads/2021/10/sarchi-wp-2023-06-bhorat-et-al-may-2023.pdf">https://www.uj.ac.za/wp-content/uploads/2021/10/sarchi-wp-2023-06-bhorat-et-al-may-2023.pdf</a> [Accessed 2024/07/24]

Bhorat, H., Köhler, T., and Monnakgotla, J., 2024. Social Security Coverage among the Working-Age Population in South Africa. Development Policy Research Unit Working Paper 202404. DPRU, University of Cape Town. Available: <a href="https://commerce.uct.ac.za/sites/default/files/media/documents/commerce\_uct\_ac\_za/1093/dpru-wp202404.pdf">https://commerce.uct\_ac.za/sites/default/files/media/documents/commerce\_uct\_ac\_za/1093/dpru-wp202404.pdf</a> [Accessed 2024/07/19]

Branson, N. and Leibbrandt, M., 2013. Educational attainment and labour market outcomes in South Africa, 1994-2010. OECD Economics Department Working Papers, No. 1022. DOI: https://dx.doi.org/10.1787/5k4c0vvbvv0g-en

Chatterjee, A., Czajka, L., Gethin, A., 2020 Estimating the distribution of household wealth in South Africa. WIDER Working Paper 2020/45. Helsinki: UNU-WIDER. https://doi.org/10.35188/UNU-WIDER/2020/802-3

Cole, M.J., Bailey, R.M., Cullis, J.D.S. and New, M.G., 2018. Spatial inequality in water access and water use in South Africa. Water Policy, 20(1): 37-52. DOI: https://doi.org/10.2166/wp.2017.111

Department of Basic Education, 2024. National Senior Certificate 2023: Examination Report. Available: <a href="https://www.education.gov.za/">https://www.education.gov.za/</a> Portals/0/Documents/Reports/2021NSCReports/NSC23%20Technical%20Report.pdf?ver=2024-01-18-161615-123 [Accessed 2024/07/23]

- 2011. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 285). Government Gazette, 34169, March 2011.
- 2012. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 256). Government Gazette, 35189, March 2012.
- 2013. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 712). Government Gazette, 36292, September 2013.
- 2014. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 211). Government Gazette, 37474, March 2014.
- 2015. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 277). Government Gazette, 38647, March 2015.
- 2016. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 1210). Government Gazette, 40323, October 2016.
- 2017. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 305). Government Gazette, 40754, March 2017.
- 2018. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 362). Government Gazette, 41526, March 2018.
- 2019. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 490). Government Gazette, 42337, March 2019.
- 2020. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 361). Government Gazette, 43143, March 2020.
- 2021. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 286). Government Gazette, 44377, March 2021.

- 2022. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 1947). Government Gazette, 46144, March 2022.
- 2023. Social Assistance Act, 2004 (Act No. 13 of 2004) as amended: Increase in respect of Social Grants. (Notice 3208). Government Gazette, 48321, March 2023.

Department of Provincial and Local Government, 2005. National Framework for Municipal Indigent Policies. Pretoria: Government Printers.

Ebenezer, M. and Abbyssinia, M., 2018. Livelihood diversification and its effect on household poverty in Eastern Cape province, South Africa. The Journal of Developing Areas, 52(1): 235-249. URL: <a href="https://www.jstor.org/stable/10.2307/26417004">https://www.jstor.org/stable/10.2307/26417004</a>

European Commission, 2014. Social Europe: Many ways, one objective. Annual Report of the Social Protection Committee on the social situation in the European Union (2013). Publications Office of the European Union, Luxembourg. Available: <a href="https://ec.europa.eu/social/BlobServlet?docId=11503&langId=en">https://ec.europa.eu/social/BlobServlet?docId=11503&langId=en</a> [Accessed 2024/07/19]

Feder, J. and Yu, D., 2020. Employed yet poor: low-wage employment and working poverty in South Africa. Development Southern Africa, 37(3): 363-381. DOI: https://doi.org/10.1080/0376835X.2019.1597682

Finn, A., 2015. A national minimum wage in the context of the South African labour market. SALDRU Working Paper No. 153. Southern Africa Labour and Development Research Unit, University of Cape Town. Available: <a href="http://hdl.handle.net/11090/786">http://hdl.handle.net/11090/786</a> [Accessed 2024/07/18]

Finn, A. Leibbrandt, M. and Woolard, I., 2013. What happened to multidimensional poverty in South Africa between 1993 and 2010? SALDRU Working Paper No. 99. Southern Africa Labour and Development Research Unit, University of Cape Town. Available: <a href="http://hdl.handle.net/11090/615">http://hdl.handle.net/11090/615</a> [Accessed 2024/07/19]

Foster, J., Greer, J., and Thorbecke, E., 1984. A class of decomposable poverty measures. Econometrica, 52(3): 761-766.

Foster, J., Greer, J. and Thorbecke, E., 2010. The Foster-Greer-Thorbecke (FGT) poverty measures: 25 years later. The Journal of Economic Inequality, 8(4): pp. 491 – 524. Doi: 10.1007/s10888-010-9136-1

Frame, E., De Lannoy, A. and Leibbrandt, M., 2016. Measuring multidimensional poverty among youth in South Africa at the sub-national level. SALDRU Working Paper No. 169. Southern Africa Labour and Development Research Unit, University of Cape Town. Available: <a href="http://hdl.handle.net/11090/818">http://hdl.handle.net/11090/818</a> [Accessed 2024/07/19]

Fransman, T. and Yu, D., 2019. Multidimensional poverty in South Africa 2001-16. Development Southern Africa, 36(1): 50-79. DOI: <a href="https://doi.org/10.1080/0376835X.2018.1469971">https://doi.org/10.1080/0376835X.2018.1469971</a>

Gaede, B. and Versteeg, M., 2011. The state of the right to health in rural South Africa. South African Health Review, 2011:1. URL: <a href="https://hdl.handle.net/10520/EJC119080">https://hdl.handle.net/10520/EJC119080</a>

Goebel, A., 2007. Sustainable urban development? Low-cost housing challenges in South Africa. Habitat International, 31(3-4): 291-302. DOI: https://doi.org/10.1016/j.habitatint.2007.03.001

Hall K, Woolard I, Lake L & Smith C (eds.), 2012. South African Child Gauge 2012. Cape Town: Children's Institute, University of Cape Town.

Harper, C. Marcus, R. and Moore, K., 2003. Enduring poverty and the conditions of childhood: Lifecourse and intergenerational poverty transmissions. World Development, 31(3): 535-554. DOI: https://doi.org/10.1016/S0305-750X(03)00010-X

Harris, B. Goudge, J. Ataguba, J.E., McIntyre, D. Nxumalo, N., Jikwana, S. and Chersich, M., 2011. Inequities in access to health care in South Africa. Journal of Public Health Policy, 32: S102-S123. DOI: https://doi.org/10.1057/jphp.2011.35

Huchzermeyer, M., 2001. Housing for the poor? Negotiated housing policy in South Africa. Habitat International, 25(3): 303-331. DOI: https://doi.org/10.1016/S0197-3975(00)00037-0

Hundenborn, J., Leibbrandt, M. and Woolard, I., 2018. Drivers of Inequality in South Africa. UNU-WIDER Working Paper No. 162/2018. Helsinki: UNU-WIDER. DOI: <a href="https://doi.org/10.35188/UNU-WIDER/2018/604-3">https://doi.org/10.35188/UNU-WIDER/2018/604-3</a>

Inglesi-Lotz, R., 2023. Load shedding in South Africa: Another nail in income inequality? South African Journal of Science, 119(9/10): DOI: https://doi.org/10.17159/sajs.2023/16597

International Labour Organisation (ILO), 2005. Chapter 4: Measures of Poverty. International Labour Organisation, Geneva. Available: <a href="https://www.ilo.org/media/289306/download">https://www.ilo.org/media/289306/download</a> [Accessed 2024/07/23]

International Labour Organization (ILO), 2022. Extension of Social Security to Informal Sector workers, Self Employed and Atypical Workers Consultative Workshop. ILO, Switzerland. Available: <a href="https://www.ilo.org/meetings-and-events/extension-social-security-informal-sector-workers-self-employed-and">https://www.ilo.org/meetings-and-events/extension-social-security-informal-sector-workers-self-employed-and</a> [Accessed 2024/07/23]

Jakubiak-Lasocka, J., Lasocki, J., Siekmeier, R. and Chłopek, Z., 2014. Impact of Traffic-Related Air Pollution on Health. In: Pokorski, M. (eds) Environment Exposure to Pollutants. Advances in Experimental Medicine and Biology, 834: 21-29. DOI: <a href="https://doi.org/10.1007/5584\_2014\_14">https://doi.org/10.1007/5584\_2014\_14</a>

Jolliffe, D.M., Mahler, D.G., Lakner, C., Atamanov, A. and Tetteh Baah, S.K., 2022. Assessing the impact of the 2017 PPPs on the international poverty line and global poverty. Policy Researching Working Paper No. 9941. World Bank Group, Washington D.C. Available: <a href="https://documents.worldbank.org/en/publication/documents-reports/documentdetail/353811645450974574/assessing-the-impact-of-the-2017-ppps-on-the-international-poverty-line-and-global-poverty">https://documents-reports/documentdetail/353811645450974574/assessing-the-impact-of-the-2017-ppps-on-the-international-poverty-line-and-global-poverty</a> [Accessed 2024/07/22]

Kara, A.M. and Kithu, L.M., 2020. Education Attainment of Head of Household and Household Food Security: A Case for Yatta Sub-County, Kenya. American Journal of Educational Research, 8(8): 558-566. DOI:10.12691/education-8-8-7.

Kerr, A. and Wittenberg, M., 2019. Earnings and employment microdata in South Africa. WIDER Working Paper No. 2019/47. Helsinki: United Nations World Institute for Development Economic Research (UNU-WIDER).

Köhler, T. and Bhorat, H., 2020. Covid-19, Social Protection and the Labour Market in South Africa: Are social grants being targeted at the most vulnerable? DPRU Working Paper No. 202008. Development Policy Research Unit, University of Cape Town. Available: <a href="https://commerce.uct.ac.za/sites/default/files/content\_migration/commerce\_uct\_ac\_za/1093/files/DPRU%2520WP%2520202008.pdf">https://commerce.uct.ac.za/sites/default/files/content\_migration/commerce\_uct\_ac\_za/1093/files/DPRU%2520WP%2520202008.pdf</a> [Accessed 2024/07/191

- 2023. Wages and Wage Inequality during the COVID-19 Pandemic in South Africa. Development Policy Research Unit Working Paper 202308. DPRU, University of Cape Town. Available: <a href="https://commerce.uct.ac.za/sites/default/files/media/documents/commerce\_uct\_ac\_za/1093/DPRU%20WP%2020308.pdf">https://commerce.uct.ac.za/sites/default/files/media/documents/commerce\_uct\_ac\_za/1093/DPRU%20WP%2020308.pdf</a>

Lanau, A., Mack, J. and Nandy, S., 2020. Including services in multidimensional poverty measurement for SDGs: modifications to the consensual approach. Journal of Poverty and Social Justice, 28(2): 149-168. DOI: https://doi.org/10.1332/175982720X15850580703755

Leibbrandt, M., Bhorat, H., and Woolard, I., 1999.Understanding Contemporary Household Inequality in South Africa. . Development Policy Research Unit Working Paper 99/25. DPRU, University of Cape Town. Available: <a href="https://open.uct.ac.za/server/api/core/bitstreams/b522b4dc-6bdf-4e2d-b4de-fc0566820ec4/content">https://open.uct.ac.za/server/api/core/bitstreams/b522b4dc-6bdf-4e2d-b4de-fc0566820ec4/content</a>

Leibbrandt, M., Finn, A. and Woolard, I., 2012. Describing and decomposing post-apartheid income and inequality in South Africa. Development Southern Africa, 29(1): pp. 19 – 34. DOI: https://doi.org/10.1080/0376835X.2012.645639

Lemanski, C., 2010. Homeownership as a solution to poverty in urban South Africa. International Journal of Urban and Regional Research, 35(1): 57-77. DOI: https://doi.org/10.1111/j.1468-2427.2010.00945.x

Letseka, M. and Maile, S., 2008. High university drop-out rates: A threat to South Africa's future. HSRC Policy Brief. URL: <a href="http://hdl.handle.net/20.500.11910/4967">http://hdl.handle.net/20.500.11910/4967</a>

Lilenstein, K., Woolard, I. and Leibbrandt, M., 2016. In-work poverty in South Africa: The impact of income sharing in the presence of high unemployment. SALDRU Working Paper No. 193. Southern Africa Labour and Development Research Unit, University of Cape Town. Available: <a href="http://hdl.handle.net/11090/852">http://hdl.handle.net/11090/852</a> [Accessed 2024/07/18]

Maistry, S.M. Africa, I.E., 2020. Neoliberal stratification: The confounding effect of the school poverty quintile ranking system in South Africa. South African Journal of Education, 40(4): DOI: https://doi.org/10.15700/saie.v40n4a1872

Makoka, D. and Kaplan, M., 2005. Poverty and Vulnerability – An Interdisciplinary Approach. MRPA Paper No. 6964. University Library of Munich, Germany. Available: https://mpra.ub.uni-muenchen.de/6964/1/MPRA\_paper\_6964.pdf [Accessed 2024/07/19]

Maphumulo, W.T. and Bhengu, B.R., 2019. Challenges of quality improvement in the healthcare of South Africa post-apartheid: A critical review. Curationis, 42)1). URL: <a href="https://hdl.handle.net/10520/EJC-170ff325f8">https://hdl.handle.net/10520/EJC-170ff325f8</a>

Manomano, T. and Tanga, P.T., 2018. Housing needs: The quality and quantity of housing provided by the government for the poor in the Eastern Cape province in South Africa. Social Work, 54(1): 18-36. DOI: http://dx.doi.org/10.15270/54-1-612

Massa, R., Fondevila, G., Gutiérrez-Meave, R., and Bonilla Alguera, G., 2023. Clandestine Dumpsites and Crime in Mexico City: Revisiting the Broken Windows Theory. Crime & Delinquency, 0(0). DOI: <a href="https://doi.org/10.1177/00111287231186083">https://doi.org/10.1177/00111287231186083</a>

McKay, T., 2020. South Africa's Key Urban Transport Challenges. In: Masse, R. Gunter, A. (eds) Urban Geography in South Africa. DOI: <a href="https://doi.org/10.1007/978-3-030-25369-1\_12">https://doi.org/10.1007/978-3-030-25369-1\_12</a>

Misselhorn. A. and Hendriks, S.L., 2017. A systematic review of sub-national food insecurity research in South Africa: Missed opportunities for policy insights. PLoS ONE, 12(8): e0182399. DOI: https://doi.org/10.1371/journal.pone.0182399

Mlambo, V., 2018. An overview of rural-urban migration in South Africa: Its implications. Archives of Business Research, 6(4): 63-70. DOI: https://doi.org/10.14738/abr.64.4407

Moselakgomo, M., Mokonyama, M.T. and Okonta, F., 2017. The relationship between urban neighbourhood type and commuting distance in Gauteng City region, South Africa. A preliminary analysis. Southern African Transport Conference 2017, 10-13 July 2017, CSIR International Convention Centre, Pretoria. Available: <a href="http://hdl.handle.net/10204/9621">http://hdl.handle.net/10204/9621</a>

Mtshweni, B.V., 2021. Adjustment and socioeconomic status: How do these factors influence the intention to drop out of university? South African Journal of Psychology, 52(2): 262-274. DOI: https://doi.org/10.1177/00812463211059141

Mushongera, D., Zikhali, P. and Ngwenya, P., 2017. A Multidimensional Poverty Index for Gauteng Province, South Africa: Evidence from Quality of Life Survey Data. Social Indicators Research, 130: 277-303. DOI: <a href="https://doi.org/10.1007/s11205-015-1176-2">https://doi.org/10.1007/s11205-015-1176-2</a>

National Planning Commission (NPC), 2012. National Development Plan 2030. Pretoria: Government Printer.

Omotoso, K.O. and Koch, S.F., 2018a. Assessing changes in social determinants of health inequalities in South Africa: A decomposition analysis. International Journal for Equity in Health 17(181): 1-13. DOI: https://doi.org/10.1186/s12939-018-0885-y

Omotoso, K.O. and Koch, S. F., 2018b. Exploring child poverty and inequality in post-apartheid South Africa: a multidimensional perspective. Journal of Poverty and Social Justice, 26(3): 417-437. DOI: <a href="https://doi.org/10.1332/175982718X15361435470229">https://doi.org/10.1332/175982718X15361435470229</a>.

Oosthuizen, M., 2007. Consumer Price Inflation across the Income Distribution in South Africa. DPRU Working Paper 07/129. November. Development Policy Research Unit, University of Cape Town. Available: <a href="http://hdl.handle.net/11427/7276">http://hdl.handle.net/11427/7276</a>.

Pietermaritzburg Economic Justice and Dignity Group [PEJDG], 2020. Household Affordability Index October 2020. Own publication. Available: <a href="https://pmbeid.org.za/wp-content/uploads/2020/10/October-2020-Household-Affordability-Index-PMBEID">https://pmbeid.org.za/wp-content/uploads/2020/10/October-2020-Household-Affordability-Index-PMBEID</a> 15102020.pdf.

– 2024. Household Affordability Index October 2024. Own publication. Available: <a href="https://pmbejd.org.za/wp-content/uploads/2024/10/">https://pmbejd.org.za/wp-content/uploads/2024/10/</a> October 2024. Household-Affordability-Index-PMBEID 23102024.pdf.

Rhodes, B. and McKenzie, T., 2018. To what extent does socio-economic status still affect household access to water and sanitation services in South Africa? Journal of Economic and Financial Sciences 11(1), a173. DOI: <a href="http://dx.doi.org/10.4102/jef.v11i1.173">http://dx.doi.org/10.4102/jef.v11i1.173</a>

Rogan, M., 2010. Poverty and headship in post-apartheid South Africa, 1997 – 2006. The global economic crisis and South Africa: Lessons in long-run economic growth and development. Indaba Hotel and Conference Centre, 27-29 October. Available: <a href="https://www.tips.org.za/files/poverty">https://www.tips.org.za/files/poverty</a> and headship in post-apartheid south africa.pdf [Accessed 17/09/2024].

– 2016. Gender and multidimensional poverty in South Africa: Applying the Global Multidimensional Poverty Index (MPI). Social Indicators Research, 126(3): 987-1006. DOI: <a href="http://dx.doi.org/10.1007/s11205-015-0937-2">http://dx.doi.org/10.1007/s11205-015-0937-2</a>

Rogan, M. and Reynolds, J., 2015. The working poor in South Africa, 1997-2012. Institute of Social and Economic Research Working Paper No. 2015/4. Institute of Social and Economic Research, Rhodes University. Available: <a href="https://www.researchgate.net/">https://www.researchgate.net/</a> <a href="https://www.researchgate.net/">publication/281435814</a> The Working Poor in South Africa 1997-2012 [Accessed 2024/09/18]

Ross, C.E. and Wu, C., 1995. The links between education and health. American Sociological Review, 60(5): 719-745. DOI: <a href="https://doi.org/10.2307/2096319">https://doi.org/10.2307/2096319</a>

Savari, M., Sheykhi, H. and Amghani, M.S., 2020. The rile of educational channels in the motivating of rural women to improve household food security. One Health, 10: 100150. DOI: <a href="https://doi.org/10.1016/j.onehlt.2020.100150">https://doi.org/10.1016/j.onehlt.2020.100150</a>

Schmidt, C.W., 2008. The Yuck Factor When Disgust Meets Discovery. Environmental Health Perspectives, 166(12): A524-A527. DOI: https://doi.org/10.1289/ehp.116-a524

Schmitz, P.M.U., 2018. Food insecurity, Fortunate index, and refuse removal as indicators for resilience to disasters. In Behr,F-J. Brönner, C. Orti, M. Negussie, K. (eds.). Geoscience for Crisis Management: Applied Geoinformatics for Society and Environment. Stuttgart, Germany: AGSE. 90-101.

Schoeman, T. and Saunders, M., 2018. The impact of power outages on small businesses in the City of Johannesburg. 10th International Conference on Education, Business, Humanities, and Social Sciences Studies, 19-20 November, Cape Town, South Africa. DOI: <a href="https://doi.org/10.17758/EARES4.EAP1118411">https://doi.org/10.17758/EARES4.EAP1118411</a>

Seekings, J., 2000. Introduction: Urban Studies in South Africa after Apartheid. International Journal of Urban & Regional Research, 24(4). DOI: <a href="https://doi.org/10.1111/1468-2427.00281">https://doi.org/10.1111/1468-2427.00281</a>

Seekings, J., Leibbrandt, M. and Nattrass, N., 2004. Income Inequality after Apartheid. Centre for Social Science Research Working Paper No. 75, Southern Africa Labour and Development Research Unit, University of Cape Town. Available: <a href="https://www.opensaldru.uct.ac.za/handle/11090/643">https://www.opensaldru.uct.ac.za/handle/11090/643</a> [Accessed 2024/09/10].

Sharma, M., 2023. Poverty and gender: determinants of female- and male-headed households with children in poverty in the USA, 2019. Sustainability, 15(9): 7602. DOI: <a href="https://doi.org/10.3390/su15097602">https://doi.org/10.3390/su15097602</a>

Shifa, M., Mabhena, R., Ranchod, V. and Leibbrandt, M., 2023. An assessment of inequality estimates in South Africa. UNU-WIDER Working Paper No.90/2023. Helsinki: UNU-WIDER. DOI: <a href="https://doi.org/10.35188/UNU-WIDER/2023/398-7">https://doi.org/10.35188/UNU-WIDER/2023/398-7</a>

Soe, T.K., Laohasiriwong, W., Sornlorm, K., and Mahato, R.K., 2023 Safely managed sanitation practice and childhood stunting among under five years old children in Myanmar. PLoS ONE, 18(11): e0290600. DOI: https://doi.org/10.1371/journal.pone.0290600

Sommer, H., Seethaler, R., Chanel O., Herry, M., Masson, S. and Vergnaud, J.C., 1999, June. Health costs due to road traffic-related air pollution. In An impact assessment project report on Austria, France and Switzerland and prepared for the WHO Ministerial Conference on Environment and Health. London: Federal Department of Environment, Transport, Energy and Communications Bureau for Transport

South Africa, 1996. Constitution of the Republic of South Africa, 1996. Pretoria: Government Printer.

South African Reserve Bank (SARB), 2024. Quarterly Bulletin No. 313. September. Available: <a href="https://www.resbank.co.za/">https://www.resbank.co.za/</a> [Accessed: 2024/09/30]

South African Social Security Agency (SASSA), 2023. SASSA Annual Report 2022/23. SASSA, Pretoria. Available: <a href="https://www.sassa.gov.za/annual%20reports/Documents/SASSA%20ANNUAL%20REPORT%202022-23.pdf">https://www.sassa.gov.za/annual%20reports/Documents/SASSA%20ANNUAL%20REPORT%202022-23.pdf</a>

- 024. SASSA Annual Report 2022/23. Pretoria, South Africa. Available: <a href="https://www.sassa.gov.za/annual%20reports/Documents/SASSA%20ANNUAL%20REPORT%202022-23.pdf">https://www.sassa.gov.za/annual%20reports/Documents/SASSA%20ANNUAL%20REPORT%202022-23.pdf</a> [Accessed 2024/07/23]

Spaull, N., 2015. Schooling in South Africa: How low-quality education becomes a poverty trap. South African Child Gauge. Available: <a href="https://ci.uct.ac.za/sites/default/files/content\_migration/health\_uct\_ac\_za/533/files/Child\_Gauge\_2015-Schooling.pdf">https://ci.uct.ac.za/sites/default/files/content\_migration/health\_uct\_ac\_za/533/files/Child\_Gauge\_2015-Schooling.pdf</a> [Accessed 2024/07/25].

Statistics South Africa (Stats SA), 2014. The South African MPI: Creating a multidimensional poverty index using census data. Report No. 03-10-08. Statistics South Africa: Pretoria. Available: <a href="https://www.statssa.gov.za/publications/Report-03-10-08/Report-03-08/Report-03-10-08/Report-03-08/Report-03-08/Repor

- 2017a. Poverty Trends in South Africa, No. 03-10-06. Pretoria: Statistics South Africa.
- 2019. Inequality trends in South Africa: A Multidimensional diagnostic of inequality. Pretoria: Statistics South Africa. Available: <a href="https://www.statssa.gov.za/publications/Report-03-10-19/Report-03-10-192017.pdf">https://www.statssa.gov.za/publications/Report-03-10-19/Report-03-10-192017.pdf</a> [Accessed 2024/09/20]
- 2020. Education Series Volume VI: Education and Labour Market Outcomes in South Africa, 2018. Statistics South Africa: Pretoria. Available: <a href="https://www.statssa.gov.za/publications/92-01-06/92-01-062018.pdf">https://www.statssa.gov.za/publications/92-01-06/92-01-062018.pdf</a> [Accessed 2024/07/22]
- 2022. Census 2022. Statistical Release P0301.4. Statistics South Africa: Pretoria. Available: <a href="https://census.statssa.gov.za/assets/documents/2022/P03014\_Census\_2022\_Statistical\_Release.pdf">https://census.statssa.gov.za/assets/documents/2022/P03014\_Census\_2022\_Statistical\_Release.pdf</a> [Accessed 2024/09/18]
- 2023. National Poverty Lines. Statistical Release P0310.1. Statistics South Africa: Pretoria. Available: <a href="https://www.statssa.gov.za/publications/P03101/P031012023.pdf">https://www.statssa.gov.za/publications/P03101/P031012023.pdf</a> [Accessed 2024/08/30]

2024a. Consumer Price Index (CPI). Statistical Release P0141. Statistics South Africa: Pretoria. Available: <a href="https://www.statssa.gov.za/publications/P0141/CPIHistorv.pdf?SCH=0">https://www.statssa.gov.za/publications/P0141/CPIHistorv.pdf?SCH=0</a> [Accessed 2024/07/24]

- 2024b. Mid-year population estimates 2024. Statistical Release P0302. Statistics South Africa: Pretoria. Available: <a href="https://www.statssa.gov.za/publications/P0302/P03022024.pdf">https://www.statssa.gov.za/publications/P0302/P03022024.pdf</a> [Accessed 2024/08/19]
- 2024c. Non-financial Census of Municipalities Survey (NFCM). Statistics Release P9115. Statistics South Africa: Pretoria. Available: https://www.statssa.gov.za/?page\_id=1854&PPN=P9115 [Accessed 2024/09/20].
- 2024d. QLFS Trends 2008-2024Q2. Available: https://www.statssa.gov.za/publications/P0211/QLFS%20Trends%202008-2024Q2.xlsx [Accessed 2024/09/09].
- various years. General Household Survey. Microdata. Statistics South Africa: Pretoria. Available: <a href="https://www.statssa.gov.za/?page\_id=1866&PPN=P0318&SCH=73897">https://www.statssa.gov.za/?page\_id=1866&PPN=P0318&SCH=73897</a>

Turok, I., 2011. Deconstructing density: Strategic dilemmas confronting the post-apartheid city. Cities, 25(5): 470-477. DOI: <a href="https://doi.org/10.1016/j.cities.2010.10.003">https://doi.org/10.1016/j.cities.2010.10.003</a>

UNICEF, 2021. A review of the use of multidimensional poverty measures: Informing advocacy, policy and accountability to address child poverty. Available: <a href="https://www.unicef.org/media/105966/file/A%20review%20of%20the%20use%20of%20multidimensional%20">https://www.unicef.org/media/105966/file/A%20review%20of%20the%20use%20of%20multidimensional%20</a> poverty%20measures.pdf [Accessed 2024/07/22]

UNU-WIDER, 2024. World Income Inequality Database (WIID)

US Bureau of Labor Statistics, 2023. A profile of the working poor, 2021. Available: <a href="https://www.bls.gov/opub/reports/working-poor/2021/home.htm">https://www.bls.gov/opub/reports/working-poor/2021/home.htm</a> [Accessed 2024/07/19]

Van de Werfhorst, H.G., 2002. A detailed examination of the role of education in intergenerational social-class mobility. Social Science Information. 41(3): 407-438. DOI: <a href="https://doi.org/10.1177/0539018402041003004">https://doi.org/10.1177/0539018402041003004</a>

Venter, C., Vokolkova, V. and Michalek, J., 2007. Gender, residential location, and household travel: empirical findings from low income urban settlements in Durban, South Africa. Transport Reviews, 27(6): 653-677. DOI: https://doi.org/10.1080/01441640701450627

Vermaak, C., 2010. The impact of multiple imputation on coarsened data on estimates on the working poor in South Africa. World Institute for Development Economics Research Working Paper No. 2010/86. World Institute for Development Economics Research, United Nations University: Helsinki. Available: <a href="https://www.wider.unu.edu/sites/default/files/wp2010-86.pdf">https://www.wider.unu.edu/sites/default/files/wp2010-86.pdf</a> [Accessed 2024/07/19]

Vilnai-Yavetz, I., and Gilboa, S., 2010. The Effect of Servicescape Cleanliness on Customer Reactions. Services Marketing Quarterly, 31(2): 213–234. DOI: https://doi.org/10.1080/15332961003604386

Winter, D., 2011. Power outages and their impact on South Africa's water and wastewater sectors. Water Research Commission, Report No. KV 267/11. Available: <a href="https://www.wrc.org.za/wp-content/uploads/mdocs/KV%20267-111.pdf">https://www.wrc.org.za/wp-content/uploads/mdocs/KV%20267-111.pdf</a> [Accessed 2024/17/18].

Wittenberg, M., 2017. Wages and wage inequality in South Africa 1994–2011: part 1-wage measurement and trends. South African Journal of Economics, 85(2): 279-297. DOI: https://doi.org/10.1111/saie.12148

World Bank, 2018. Overcoming poverty and inequality in South Africa: An Assessment of Drivers, Constraints and Opportunities. Washington, DC: The World Bank. Available: <a href="https://documents1.worldbank.org/curated/en/530481521735906534/pdf/Overcoming-Poverty-and-Inequality-in-South-Africa-An-Assessment-of-Drivers-Constraints-and-Opportunities.pdf">https://documents1.worldbank.org/curated/en/530481521735906534/pdf/Overcoming-Poverty-and-Inequality-in-South-Africa-An-Assessment-of-Drivers-Constraints-and-Opportunities.pdf</a>

- 2021. South Africa: Social Assistance Programs and Systems Review. Washington: World Bank. The International Bank for Reconstruction and Development/ The World Bank, Washington, DC. Available: <a href="https://documents1.worldbank.org/curated/en/238611633430611402/pdf/South-Africa-Social-Assistance-Programs-and-Systems-Review.pdf">https://documents1.worldbank.org/curated/en/238611633430611402/pdf/South-Africa-Social-Assistance-Programs-and-Systems-Review.pdf</a> [Accessed 2024/07/23]
- 2022. Inequality in Southern Africa: An Assessment of the Southern African Customs Union. Washington DC: The World Bank. Available: <a href="http://documents.worldbank.org/curated/en/099125303072236903/P1649270c02a1f06b0a3ae02e57eadd7a82">http://documents.worldbank.org/curated/en/099125303072236903/P1649270c02a1f06b0a3ae02e57eadd7a82</a> [Accessed 2024/09/10].

# 8. Appendix

TABLE 14. Wage sample size, bracket responses, point estimate non-responses, and imputation information

		Bracket	S	Exact Valu	ies	Imputed Data		
Year	Employed	Missing data/ Don't know/Refuse	Missing data	Missing data/ Don't know/Refuse	Missing data	Imputations	Imputations	
	(n)	(n)	(rate, %)	(n)	(rate, %)	(n)	(rate, %)	
	(1)	(2)	(2)/(1)	(3)	(3)/(1)	(4)	(4)/(3)	
2011	23,143	2,537	11.0	8,558	37.0	8,430	98.5	
2012	24,237	2,795	11.5	9,904	40.9	9,716	98.1	
2013	24,892	3,904	15.7	10,167	40.8	9,925	97.6	
2014	24,635	4,013	16.3	10,341	42.0	10,061	97.3	
2015	21,211	3,457	16.3	8,734	41.2	8,387	96.0	
2016	20,462	3,644	17.8	8,650	42.3	8,440	97.6	
2017	20,310	4,028	19.8	8,493	41.8	8,273	97.4	
2018	19,901	3,865	19.4	8,424	42.3	8,220	97.6	
2019	18,162	4,029	22.2	9,373	51.6	9,140	97.5	
2020	7,115	1,877	26.4	4,132	58.1	4,057	98.2	
2021	7,875	1,912	24.3	4,684	59.5	4,606	98.3	
2022	16,577	4,103	24.8	10,057	60.7	9,782	97.3	
2023	18,941	2,937	15.5	11,352	59.9	11,071	97.5	
Total	247,461	43,101	17.4	112,869	45.6	110,108	97.6	

Source: Own calculations General Household Survey (2011-2023).

TABLE 15. Individual- and household-level poverty rates at different poverty lines, 2011-2023

	Indivi	dual-Level Poverty	Rates	Household-Level Poverty Rates						
Year	Food Poverty Line	Lower-Bound Poverty Line	Upper-Bound Poverty Line	Food Poverty Line	Lower-Bound Poverty Line	Upper-Bound Poverty Line				
2011	25.3	38.6	51.6	19.8	30.2	41.5				
2012	24.3	36.9	50.1	18.6	28.4	40.0				
2013	23.8	36.1	49.3	19.2	28.6	40.3				
2014	21.6	33.4	47.0	17.1	26.1	37.4				
2015	22.2	33.9	46.6	17.0	25.9	36.7				
2016	35.1	47.0	58.9	26.7	35.8	47.1				
2017	23.5	33.9	46.7	17.8	25.3	36.6				
2018	25.9	35.8	47.0	20.9	28.0	38.2				
2019	21.8	32.7	44.9	18.0	26.0	36.9				
2020	23.8	36.8	50.6	21.3	30.3	42.1				
2021	24.4	36.6	49.5	19.5	28.3	40.2				
2022	24.7	35.9	48.2	20.6	28.4	39.4				
2023	25.5	36.8	48.8	20.8	29.8	39.5				

Source: Own calculations, GHS (2011-2023), Statistics South Africa (2023).

Notes: Poverty lines are Statistics South Africa's published poverty lines for each year.

TABLE 16. Share of population and income by income decile, 2011-2023

Year	Aggregate	D1	D2	D3	D4	D5	D6	D7	D8	D9	D10	Total (mil)
2011	Population	10.5	15.3	12.8	11.5	10.3	8.1	9.5	8.2	7.5	6.3	F1.C
2011	Income	0.3	1.0	1.6	2.3	3.3	4.6	7.3	11.1	19.5	49.1	51.6
2012	Population	10.8	15.7	12.7	10.9	9.8	9.4	8.5	8.1	7.6	6.2	52.3
2012	Income	0.3	1.0	1.5	2.1	3.3	4.3	6.7	10.8	19.0	51.0	52.5
2012	Population	9.7	15.1	12.9	11.1	9.7	9.8	8.9	8.4	8.0	6.3	53.1
2013	Income	0.3	0.9	1.5	2.1	3.2	4.6	7.2	11.4	19.8	48.9	
2014	Population	11.0	15.2	11.7	11.5	9.8	9.2	8.8	8.2	7.8	6.8	53.9
2014	Income	0.3	1.0	1.5	2.2	3.3	4.7	7.0	11.0	19.1	49.8	55.9
2015	Population	10.9	15.2	12.5	11.6	8.8	9.4	8.6	8.5	7.8	6.7	540
2015	Income	0.3	1.1	1.6	2.4	3.5	4.8	7.2	11.3	19.1	48.9	54.8
2016	Population	11.6	14.9	12.5	11.2	8.7	9.7	8.5	8.4	7.9	6.6	55.6
2016	Income	0.3	1.0	1.6	2.4	3.4	5.2	6.9	11.1	19.6	48.4	
2017	Population	11.2	15.7	12.6	11.0	8.9	9.3	8.5	8.4	7.7	6.7	56.5
2017	Income	0.3	1.1	1.7	2.4	3.4	4.9	7.2	11.4	18.7	48.7	
2018	Population	11.9	15.5	11.4	11.5	8.9	9.7	8.9	8.2	7.5	6.5	57.5
2016	Income	0.3	1.1	1.7	2.6	3.6	5.3	7.8	11.8	19.8	46.0	37.3
2019	Population	9.9	14.5	12.8	11.7	9.2	10.0	8.8	8.7	7.8	6.6	58.4
2019	Income	0.3	0.9	1.5	2.1	3.0	4.4	6.5	10.4	17.5	53.4	30.4
2020	Population	9.9	11.6	15.0	12.0	11.0	8.7	9.3	8.5	7.9	6.1	59.4
2020	Income	0.4	0.9	1.7	2.4	3.4	4.8	7.2	11.3	19.1	48.7	39.4
2021	Population	10.8	14.1	13.6	10.7	9.7	10.0	8.9	8.1	8.1	6.0	60.5
2021	Income	0.4	1.2	2.0	2.5	3.9	5.4	7.9	11.5	21.0	44.1	00.5
2022	Population	9.1	14.9	13.5	11.5	9.4	9.3	8.7	8.7	8.0	7.0	61.4
2022	Income	0.3	1.0	1.7	2.4	3.7	4.6	7.1	11.4	19.7	48.0	01.4
2023	Population	8.7	15.7	12.8	12.2	8.3	10.1	9.4	8.1	7.7	6.9	62.3
-2023	Income	0.3	1.1	1.8	2.6	3.6	5.1	7.5	11.3	18.6	48.0	02.5

Source: GHS (2011, 2015, 2019, 2023), Statistics South Africa (2024a).

Notes: This is based on imputed household income variable outlined in Box 1. Unit of analysis is at the household level. Rands adjusted to December 2023 prices.

TABLE 17. Table 17. Composition of expenditure by expenditure decile, 2014/15

	D1	D2	D3	D4	D5	D6	D7	D8	D9	D10	SA
Food & non-alcoholic bev.	31.1	32.4	31.9	31.1	28.5	25.5	21.6	15.9	10.5	5.8	12.9
Alcohol and tobacco	2.2	1.9	1.9	1.9	1.8	1.6	1.4	1.2	0.9	0.4	0.9
Clothing	8.0	8.5	8.7	8.9	9.0	8.8	7.9	6.4	4.6	2.5	4.8
Housing and utilities	29	26.2	24.7	24.2	24.8	25.3	27.5	32.2	33.9	35.6	32.6
Household equipment	3.0	3.8	4.1	4.1	4.2	4.6	4.6	4.2	4.9	6.0	5.2
Health	0.9	0.8	0.9	0.8	0.8	0.8	1.0	0.8	0.8	1.0	0.9
Transport	11.8	10.7	10.7	11.3	11.1	12.0	12.9	13.8	15.1	19.6	16.3
Communication	5.0	4.8	4.6	4.5	4.4	4.4	4.0	3.8	3.6	2.7	3.4
Recreation & culture	1.4	1.7	2.2	2.3	2.7	3.3	4.1	4.1	4.3	3.9	3.8
Education	0.3	0.4	0.5	0.7	1.0	1.4	1.6	2.7	3.0	2.9	2.5
Restaurants & hotels	1.6	2.0	2.2	2.2	2.4	2.1	2.1	2.1	1.9	2.2	2.1
Miscellaneous G&S	5.7	6.8	7.6	7.9	9.1	10.0	11.1	12.9	16.3	17.3	14.7
Other	0.0	0.0	0.0	0.0	0.0	0.0	0.1	0.1	0.1	0.1	0.1

Source: LCS 2014/2015.

TABLE 18. Table 18. Incidence of utility interruptions and environmental problems by province 2023

	Noise pollution	Air pollution	Littering	Land degradation	Irregular or no refuse removal	Water supply interruptions	Daily load shedding	Water pollution
Western Cape	12.6	10.3	12.1	24.2	14.1	20.6	78.8	10.5
Eastern Cape	10.8	20.5	57.6	41.7	50.3	75.7	70.2	29.4
Northern Cape	19.2	26.8	34.3	40.8	42.5	72.6	70.5	20.9
Free State	21.7	25.1	31.1	56.7	50.5	65.1	70.6	25.9
KwaZulu-Natal	5.9	9.7	48.1	26.2	24.7	63.2	76.1	13.7
North West	15.3	30.6	49.7	31.3	59.3	67.1	75.6	23.0
Gauteng	18.9	16.1	16.5	29.7	26.7	46.8	78.9	16.4
Mpumalanga	15.8	25.0	56.2	43.3	69.5	81.7	75.8	12.5
Limpopo	6.7	13.5	75.4	30.7	41.1	69.7	89.6	12.0
South Africa	13.7	16.9	37.4	32.5	35.8	55.2	77.5	16.8

Source: Own calculations General Household Survey (2023).

Notes: Figures refer to the proportion of households experiencing each utility interruption or environmental problem.

## **Endnotes**

- 1. In the GHS, if an individual responded 'Yes' to any of the following questions (which were consistently asked across all four surveys), they were considered employed:
  - During the last calendar week (Sunday to Saturday) did [...] work for a wage, salary, commission or any payment in kind (including paid domestic work), even if it was only for one hour?
  - During the last calendar week (Sunday to Saturday) did [...] run or do any kind of business, big or small, for yourself or with one or more partners, even if it was only for one hour?
  - During the last calendar week (Sunday to Saturday) did [...] help without being paid in any kind of business, even if it was only for one hour?
  - In the last calendar week (Sunday to Saturday), even though you did not do any work for pay or profit, do you have a job or business that you definitely return to?
- 2. In the GHS, if an individual responded 'No" to all of the four questions economic activity questions, but indicated that they had been looking for a job or trying to start a business during the preceding four calendar weeks, they were classified as unemployed. This corresponds to the narrow definition of unemployment.
- 3. Since grants are means-tested, this is likely an error on the part of respondents.
- 4. In effect, all recipients of the war veterans grant receive the higher amount since they are all over the age of 75 years.
- 5. StatsSA interviews educational institutions in March each year to gather price information.
- 6. For further reading on the health impacts of traffic-related air pollution, see Jakubiak-Lasocka et al. (2014), who investigate the effects of air pollution on health, and Sommer et al. (1999), who estimate the health costs associated with road traffic-related air pollution.
- 7. See Kara and Kithu (2020) and Savari, Sheykhi, Amghani (2020) who found educational attainment of the household head is linked to food security.
- **8.** Education fosters intergenerational mobility, a phenomenon observed across income groups (Azomahou and Yitbarek, 2020). This holds even in highly educated cases (van de Werfhorst, 2002).

We would like to thank the Development Policy Research Unit, School of Economics, at the University of Cape Town for their valuable research.

