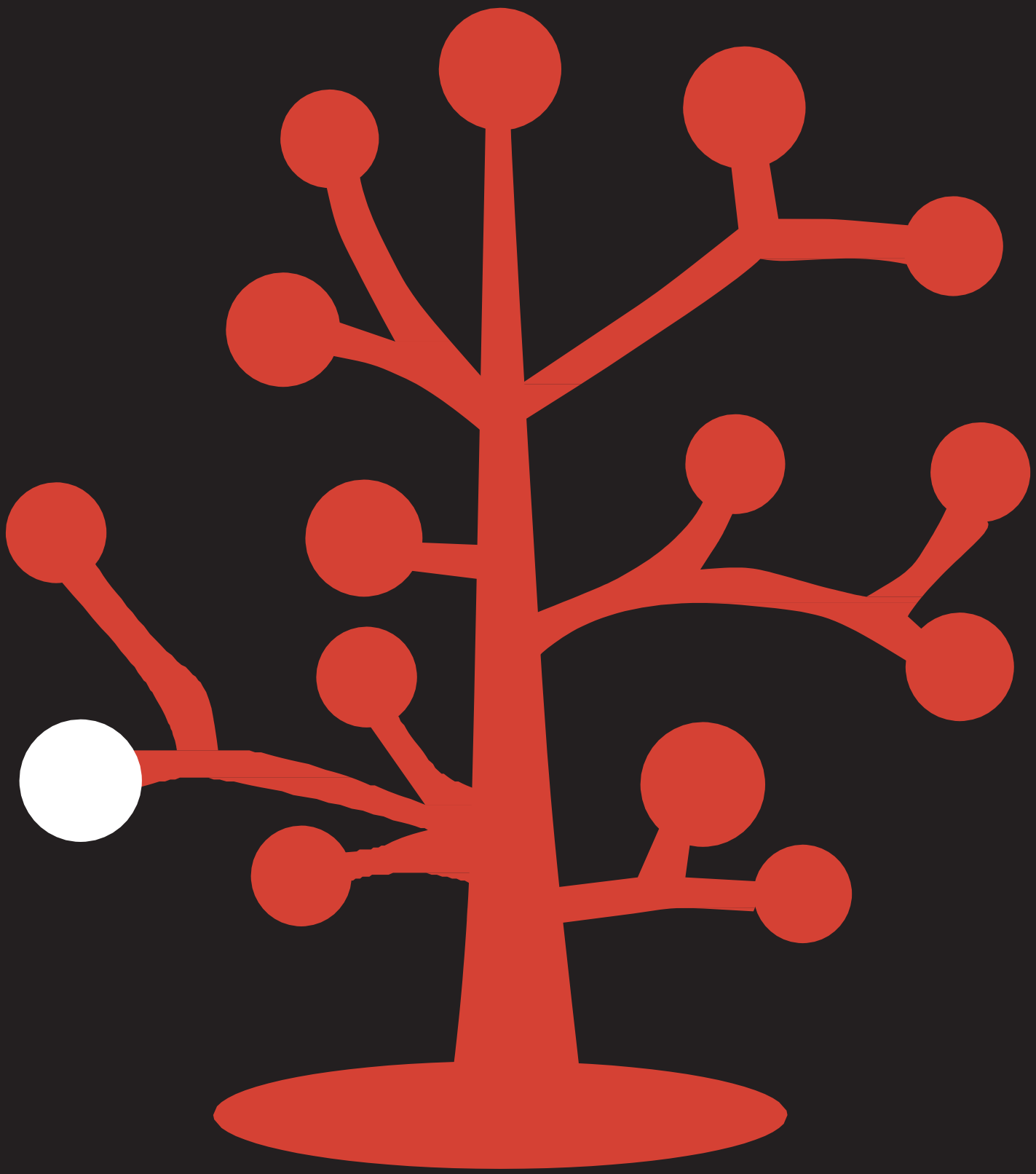
WAVE 2
OVERVIEW



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Foreword

The National Income Dynamics Study (NIDS), South Africa's national panel study, has been running since 2006, when the government commissioned the Southern African Development Research Unit at the University of Cape Town to undertake the project. **The first wave (survey round) was undertaken in 2008. The preliminary results of Wave** 2, undertaken in 2010, are presented in this brochure.

The NIDS tells us a comprehensive story about what is happening to all South Africans across the income distribution from rich to poor. It provides us with empirical data on who is getting ahead and who is being left behind and why. At aggregate level the NIDS Wave 2 data tells us that South Africans' incomes have improved marginally; however, the picture is far more complex and this is precisely where NIDS makes a unique contribution to our understanding of the changing dynamics of South African society.

The timing was such that NIDS Wave 2 was undertaken in 2010, two years after South Africa, like many other countries, had gone into a recession in 2008. The NIDS is therefore able to provide us with empirical data on the effects of the recession on South African households. Moreover, the NIDS not only provides more data but, very importantly, new data. For example, the NIDS Wave 1 provided us with school drop-out rates and in Wave 2 this is taken further; we now know what these individuals who dropped out of school are doing.

The key issue for policy-makers is to ask the pertinent questions and for the academic community to be responsive in utilising the NIDS data. This would ensure that the government's investment is maximised, and in this way the research evidence can inform our policy choices.

A very important element of this project is the training and capacity-building of government officials, researchers and students. This forward-looking approach ensures that the government's investment in the NIDS panel study has many returns.

Over time the NIDS will continue the telling of the unfolding story of South Africa.

Foreword from the Minister

Mr. Trevor A. Manuel Minister in The Presidency National Planning Commission

Preface

The National Income Dynamics Study (NIDS) is the first national panel study of individuals of all ages in South Africa. Its main objective is to measure and understand who is getting ahead and who is falling behind in South Africa, as well as why some people are making progress and others are not.

As a longitudinal study, NIDS seeks to track changes over time in the livelihoods of **respondents. NIDS goes to field every two years,** with each repetition of the survey constituting a "wave" in an ongoing statistical investigation. As the panel unfolds, it will reveal the dynamic structure of households in South Africa and changes in the living conditions and well-being of household members. A key feature of the study is its ability to follow people as they move out of their original households.

Wave 1 of the NIDS survey took place in 2008 and provides the baseline on the well-being of 28 247 sample members in 7 301 households against which to measure all future changes. The next Wave was held in 2010. Successful interviews were obtained for 6 809 households, with a total of 28 641 household residents successfully completing interviews.

This document reports on the introductory **findings of our analysis of the Wave 2 data. The findings are preliminary and seek to demonstrate** the ways in which the NIDS dataset can be used to enhance understanding of the South African socioeconomy. It is hoped, therefore, that it will simulate public debate and encourage further investigation by the research community.

NIDS is a national research resource established by The Presidency of South Africa. **The implementation agency for the first, second** and third Waves is the South African Labour and Development Research Unit (SALDRU), based in the School of Economics at the University of Cape Town. SALDRU is advised by a Technical Committee of South African and international researchers. The Steering Committee is comprised of government departments and Stats SA, as well as local and international academics.

A description of the data – along with access to questionnaires, technical and discussion papers, and the NIDS data itself – is available at http://www.nids.uct.ac.za.

The NIDS Wave 2 Team

From left to right:

Front row: Vimal Ranchhod, Ingrid Woolard, Sibongile Musundwa, Michelle Chinhema, Muloongo Simuzingili, Manono Thusi, Murray Leibbrandt.

Next row up:
James Makhamba, Reza Daniels, Nobubele Tyembile, Xolani Klaasen.

Next row up:
Adeola Oyenubi, Tim Brophy, Adrian Frith, Eliud Nkuna.

Back row:
Nevison Muzenda, Michael Brown, Andrew Partridge.

Members of the team not photographed:
Louise De Villiers, Arden Finn, Kaashief Hartley & Hilton Muller

Principal Investigators' Report

Data from socio-economic panel surveys are essential in order to describe and explain unfolding social dynamics and patterns of social mobility.

It is only these data that give us insight into who is getting ahead and who is falling behind; whether younger generations are better off than their parents; who is trapped in poverty and who is escaping poverty; and what policies and social forces are driving these changes. These are key questions for any country with a policy agenda that includes poverty and inequality alleviation and inclusive economic growth, and they are at the very heart of our policy agenda in South Africa.

This led the Presidency to launch its own national panel study, the National Income Dynamics Study (NIDS). At the broadest level, the dimensions of well-being that were to be measured were:

- wealth creation in terms of income and expenditure dynamics and asset endowments;
- demographic dynamics as these relate to household composition and migration;
- social heritage, including education and employment dynamics, the impact of life events (including positive and negative shocks), social capital and intergenerational developments; and,
- access to cash transfers and social services.

It has been SALDRU's privilege to undertake the first two waves of NIDS on behalf of the Presidency. In 2008, more than 28 000 individuals in 7 300 households were interviewed across the length and breadth of South Africa. These 28 000 people make up the panel of individuals that will be followed over time in order to track our progress. In 2010/2011 the same individuals were approached to participate again, and we gathered information on developments in their lives since they were interviewed first in 2008. As such, the comparison of Wave 1 and Wave 2 information provides a detailed picture of how South Africans have fared over two years of very difficult socioeconomic circumstances.

It has been a privilege to be part of the extraordinary team effort involved in the five-year programme that culminates in the public release of the first two waves in May 2012. The Presidency's team, consisting of Alan Hirsch, Mastoera Sadan, Vusi Gumede (Wave 1) and Kuben Naidoo (Wave 2), has managed NIDS from its conceptualisation through to the completion of this phase. At all times, they have been engaged, knowledgeable and supportive. One of their achievements has been the unique Steering Committee which they put together to oversee our work. This committee includes senior officials from Statistics South Africa and relevant line ministries, and several eminent national and international experts in panel surveys. They have made themselves available to us at any time, and we have sought their counsel at a number of key junctures over the life of the project.

Undertaking a national fieldwork campaign in South Africa is always challenging. The added complexity of a panel study in which one must track down every individual regardless of where they have moved within South Africa proved to be harder than envisaged. We thank our fieldwork companies – Nielsen, Freshly Ground Insights and Geospace International – for their hard work under difficult circumstances. At the end of the day, the people of South Africa see fieldworkers as the face of NIDS. Their role is crucial, and we offer them special thanks.

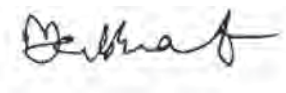
NIDS is a powerful research resource for the nation directed at bettering our understanding of our contemporary social dynamics and at better policy-making. It is a partnership between the government and the research community and, over the five years of Waves 1 and 2, SALDRU and the

Presidency have worked hard to effect this vision. The NIDS budget has provided for scholarships and training in order to encourage graduate students and young researchers, particularly those from previously disadvantaged backgrounds, to undertake research on the key themes of NIDS and to build their capacity to do this. In addition to the scholarships and funded research visits, more than 200 researchers and students have now attended training courses which use the NIDS Wave 1 data, and there have been over 1 000 downloads of these data. Now that two waves of data are available we are working hard to build the capacity of South African researchers to analyse panel data.

It is our energetic core staff that make NIDS happen. We are indebted to Louise de Villiers, Mike Brown, Michelle Chinhema, Tim Brophy, Kaashief Hartley, Xolani Klaasen, Nobubele Mata, Eliud Nkuna, Mzwandile Makhamba, Sibongile Msundwa, Arden Finn and Brenda Adams for their hard work and passionate commitment to the project. Many of these staff have been with us since the very beginning. We also thank Vimal Ranchhod who spent two years with us as a post-doctoral fellow and took on a range of special projects, including the design of the Wave 2 questionnaire and the switch from paper to Computer-Aided Personal Interviews (CAPI). Finally, we thank Reza Daniels, who joined the operation full-time in 2011 and has taken on the role of co-PI for Wave 3. Reza has been instrumental in preparing the Wave 2 data for public release and in drafting the discussion papers and this overview document.

This overview document is based on six NIDS Technical Papers (2012/01, 2012/02, 2012/03, 2012/04, 2012/05, 2012/06). We thank Andre Wiesner for compiling these into a synthesis document. We also owe a debt to our colleagues in SALDRU, who have provided expert advice, tested data, assisted with training courses and kept SALDRU going in those times when we were preoccupied with NIDS. We are particularly grateful to Cally Ardington, Martin Wittenberg, Nicola Branson and Thomas Bossuroy for the support that they have provided over the life of Wave 2.

Finally, the greatest debt of gratitude is owed to the NIDS respondents. You have been so generous in giving up hours of your time in order to allow the fieldworkers to record detailed information about you and your livelihoods in 2008 and again in 2010/11. While we are careful to ensure anonymity in the public release data, the dataset remains an aggregated picture of the characteristics and circumstances of all of you. Moreover, it is through your continued willingness to participate in Wave 3, which is currently in the field, and in subsequent waves, that NIDS will be able to serve its purpose of detailing unfolding changes in South African society and the drivers of these changes. This overview report is dedicated to you with thanks.



Murray Leibbrandt

Ingrid Woolard

–Principal Investigators for NIDS Wave 2

Main Initial Findings

1. Introduction

The preamble to the National Planning Commission's diagnosis of human conditions in South Africa observes that while constitutional democracy has brought many positive gains, "the legacy of racial, economic, gender and spatial exclusion continues to shape human development among South Africa's poor majority". It proceeds to raise questions that define the core rationale for establishing NIDS and which set the stage for this report of our findings from the Wave 2 household survey conducted in 2010:

> Social and economic exclusions are both outcomes and causes of poverty and inequality. Race, class, gender and spatial inequalities combine with new risks and vulnerabilities to reduce the freedoms and opportunities available to the vast majority of South Africa's people. … In this context, is it possible for the majority of the population to achieve an acceptable standard of living? To what extent can this be achieved through a household's own initiatives, especially private earnings from work or business, or through other means? To what degree must social protection provide a safety net to prevent people from falling into deeper poverty?

NIDS helps to lay a foundation for engaging with these and related questions so that answers which emerge can contribute to transformative, evidence-based policymaking. It does so not only by providing *more* information about the national picture; additionally, NIDS serves to generate *new* information, by making sometimes unexpected findings or identifying surprising interconnections, and thereby, it is hoped, spurring public deliberation and encouraging fresh lines of enquiry among the research community. NIDS is a powerful resource for the nation, and its dataset promises rewards for the diligent, the inventive and the socially committed.

While NIDS can add more as well as new information to our store of knowledge about South Africa, its main – and distinctive – benefit is its ability to provide rich information about socioeconomic change over time at the individual level. NIDS is unique in that it is the only nationally representative household survey in South Africa which measures longitudinal change among the same individuals. In cross-sectional surveys a random but representative sample of people is drawn to glean information about a wider population; the survey may be repeated later, but it will work with a new sample of people each time it is repeated. The central feature of NIDS is that it tracks the same respondents over set intervals of time (namely, every two years).

What this means, in figurative terms, is that whereas cross-sectional surveys offer us a snapshot of a general collectivity of people at a fixed moment, longitudinal studies such as NIDS provide a series of time-lapse photographs of individuals of a specific socioeconomic profile: each survey Wave acts as a benchmark against which the results of subsequent ones can be evaluated, with the result that the changes these individuals experienced from one Wave to the next become visible. For example, among the poorest and most vulnerable, we can see who moved in and out of different socioeconomic categories. Movement, transition, change: these are key benefits of longitudinal surveys.

Herewith we present the main initial findings of our introductory analyses of the NIDS Wave 2 dataset in relation to six thematic areas: income mobility, wealth, subjective well-being, labour market, education and health. We stress that these

are initial, exploratory findings, and if, as they ought, they combine to tell a large-scale story about South Africa in motion, this is by no means meant to suggest that it is *the* final and conclusive story. Our findings are reliably grounded on the data, but, as stated, it is our express wish that they stimulate discussion and further research. Indeed, what will become apparent is that the "big-picture" story of South Africa arises from, yet can risk occluding, a myriad of smaller South African stories, each implicated in the others but each telling a variant tale of rises and declines in fortune.

As it happened, the NIDS Wave 1 survey took place in 2008, the year in which countries worldwide entered a devastating recession. South Africa was not long to follow, and the NIDS data from 2010 thus offers a unique glimpse into how South Africans fared in this challenging period. The impact of the recession brings into relief the disparities of a society labouring under the legacy of the old; it also points to the dynamism of a society making things anew.

Our main findings are crystallised below; thereafter, they are discussed under the respective thematic subheadings.

- Despite the global recession, South Africans' average real per capita monthly income rose between 2008 and 2010. There were winners and losers in all groups, and the distribution of income change was wide. Seventy percent of respondents who fell below the poverty line in Wave 1 were again poor in Wave 2. For those who escaped poverty, the distances they covered were short.
- Household asset portfolios in South Africa are largely defined by the presence or absence of housing. Limited access to credit and high unemployment is a likely barrier to home ownership. Those who do have access to home loans form a significant part of the lowest net worth decile. There is some evidence of life cycle patterns in the net worth distribution, with significant bequest behaviour among the oldest age cohorts.
- South Africans were significantly less satisfied with their lives in 2010 than in 2008. Two-thirds of them did not think their economic situation had improved in this time. Expectations of future upward mobility were notably lower in 2010 than in 2008, especially among Africans.
- On aggregate, the employment level showed little decline. However, about a third of those individuals were who were employed in 2008 were out of work in 2010. Roughly a quarter of regular wage workers changed industry, and there was a pronounced movement out of self- and casual employment into regular employment. People who moved residence fared better than stayers in finding work and remaining employed.
- In schools, there were high rates of grade repetition, an increase in dropout from grade 7 onwards, and low completion rates. Eighty-five percent of those in grade 12 in 2008 were neither employed nor studying in 2010. Female learners perform better than males, but are less likely to find work after leaving school. Education policies are successfully targeting the poor in terms of spatial access and funding, but the poor have less choice in schooling than the rich and the basis of the quintile system is open to question.
- Children experience high rates of paternal absence.
- The obesity rate rose for both men and women, and greater numbers of women are becoming obese at each age group. About half of the children who were stunted in 2008 appear to have reversed their stunting, and being in a household that draws a state pension appears to make in difference in whether stunting is reversed or not.

2. Income Mobility

Between 2008 and 2010 the NIDS sample saw a slight increase in average per capita incomes.[1] At the time, South Africa was in the grip of an international recession and the outlook seemed bleak. Yet, as **Table 1** shows (see Appendix), the sample group experienced overall positive income change in this period. The change applies to both mean and median per capita real monthly income. Mean per capita monthly income increased by R15, and median per capita monthly income by R19. In addition, positive mean and median changes are evident in all racial groups, except for whites. Even respondents in rural and urban informal areas generally saw an improvement. The highest median growth is to be found in the lowest two income quintiles, with the top one appearing to have fared the worst. Looking only at mean income-change, all quintiles made gains except for the richest 20% in the sample.

Nevertheless, averages tell only part of the story; in particular, they make a unified story of multiple, often discrepant, realities, and hence do not in themselves convey important subtleties and variations within the data. The fact that the median income changes are so much smaller than the mean changes (even negative for those living in rural farming areas) indicates that the dispersion of changes is wider than one might realise from these averages alone.

Figure 1 represents the distribution by race of changes between Waves 1 and 2, showing that it is very wide indeed. This graph provides estimates of the distribution of real income changes for the full panel as well as Africans, coloureds and whites (the Asian/Indian sub-sample was too small for inclusion). As a group, whites experienced the widest fluctuations in income between 2008 and 2010, although given that their incomes are typically higher than those of other racial groups, these

Table 1: Mean and median changes in real monthly incomes

		Mean PC Income W1	Mean PC Income W2	Mean Change PC Income W1 to W2	Median PC Income W1	Median PC Income W2	Median Change PC Income W1 to W2
Overall		1631	1646	15	530	585	19
Racial Groups	African	923	1006	83	455	487	17
	Coloured	1562	1819	256	937	951	86
	White	7925	7260	-665	5466	5820	105
Wave 1 Income Quintiles	1	155	452	297	162	268	117
	2	329	615	286	330	362	35
	3	545	679	134	530	489	-45
	4	1098	1268	170	1030	899	-127
	5	6034	5217	-817	3928	3621	-501
Urban/Rural	Rural Formal	1150	1244	95	646	617	-61
	Tribal Authority	532	646	115	322	337	20
	Urban Formal	2811	2725	-86	1037	1113	16
	Urban Informal	694	739	45	464	556	56

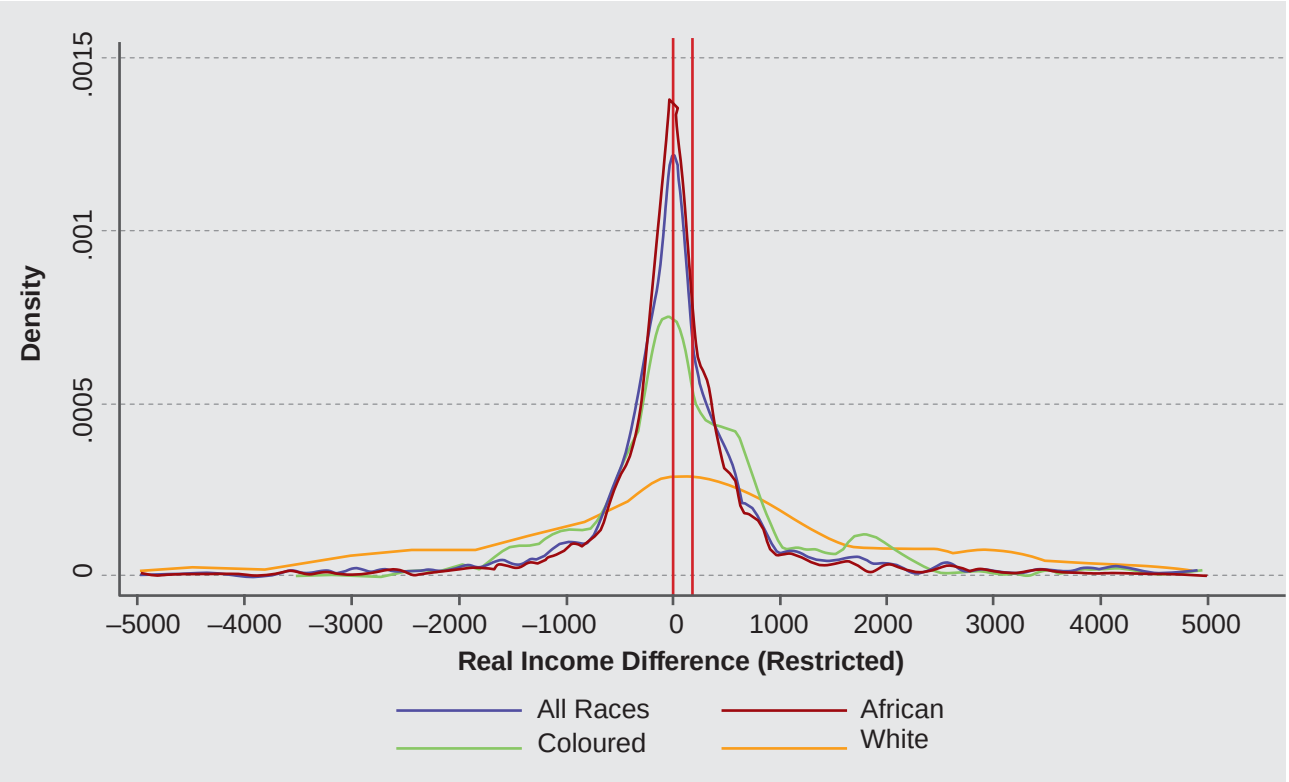


Figure 1: The distributions of changes in real incomes by race.

larger changes might not have the same impact on livelihoods that the smaller positive and negative changes have for the other groups. By comparison, the African kernel density estimates map closely onto the national distribution, according to which the most commonly experienced changes are ones ranging far more tightly between the smaller magnitudes of –R1 000 and +R1 000.

This finding is an important one, for it highlights the point that it was not inevitable that the sample would suffer an overall reverse in incomes in the recession, nor is it inevitable for the best-off to experience the best income growth and the worst-off, the worse. The higher income quintiles had negative median income change, whereas the lowest two showed positive median as well as mean gains; and while the majority of income changes clustered around the –R1 000/+R1 000 range, the figures refer to real monthly income, meaning that over a two-year period a negative or positive change of R1 000 constitutes a significant alteration of fortune especially for poor people.

It was, to reiterate, not inevitable that the rich would stay rich and the poor remain poor: across all the groups there were winners and losers, along with those who saw only relatively small positive or negative income changes and the many for whom things stayed as they were. A crucial implication which follows from this is that people's economic situation is not always and necessarily a static, irreversible or irremediable destiny, nor by extension is society at large an immutable disposition of haves and have-nots. **Figure 1** presents an expected picture inasmuch as it shows a wide variation in income change for whites, at the one end, and a narrow variation for Africans, at the other. Yet the important point it demonstrates is that, given the way in which in the African distributional estimates map so closely onto the national distribution, national income changes are to a large extent being driven by the majority African population. In plain terms, this is where the action is. Africans as a group are the major locus of income mobility.

All of this resolves into a series of questions: If the NIDS sample evinces surprising changes, shows that there were winners and losers in every group, and points to a concentration of significant to-and-fro income mobility among the historically disadvantaged, then who are the winners, losers and those whose lot remains unchanged? Who are these people, what is going well or poorly in their lives – and, above all, what can we learn from them in addressing racial, class, gender and spatial inequalities in South Africa?

A key benefit of the NIDS panel study is that, by tracking individuals over time as opposed to periodically sampling a different group of respondents, it is able to contribute to the identification of specifically vulnerable and specifically successful people through the profiles generated by the data. It can do so because, principally, the study registers change at the level of the individual. NIDS can identify who is changing, in what ways, through what probable causes, and with what observable consequences. NIDS panel data are therefore also able to pinpoint those whose plight displays no significant change at all.

Tables 2 and **3** take these concerns further by examining real income change relative, firstly, to income quintiles and, secondly, to poverty lines, thereby representing these changes precisely as inter-wave movements or transitions into and out of particular categories, and, in so doing, adding yet another layer of depth to the summary-style picture described at the outset. Both of the tables are transition matrices, with each row reflecting where individuals of a given state in 2008 are found again in 2010.

Table 2: Income mobility relative to income quintile

Wave 1 Income Quintiles	Wave 2 Income Quintiles				
	1	2	3	4	5
1	46	25	18	9	3
2	27	32	25	12	4
3	18	26	31	22	4
4	7	14	22	40	17
5	2	3	5	18	73

The grey cells on the diagonal represent the percentages that stayed in the same quintile in Wave 2 as in Wave 1.

Table 3: Income transitions into and out of poverty

Wave 1 Rands	Wave 2 Rands (inflation-adjusted)				
	<515	515–948	949–1898	>1898	
<515	70%	20	7	3	100%
515–948	41	31%	21	7	100%
949–1898	20	22	35%	22	100%
>1898	5	5	14	76%	100%

The sample is divided into four categories: those with real income less than the lower poverty line of R515; between R525 and the upper poverty line of R949; between R949 and twice this value (R1 898); and higher than R1 898. The grey cells on the diagonal represent the percentages those who stayed in the same category in Wave 2 as in Wave 1.

Table 2 indicates that, of those who were in quintile 5 in 2008, almost three-quarters were still there in 2010, with 18% having dropped a rung to quintile 4. The most movement into and out of quintiles was in quintiles 2, 3 and 4. Only 31%, 31% and 40%, respectively, remained where they initially were; at the same time, much of that movement is restricted to relatively short "distances". After those in quintile 5, it was those in quintile 1 who moved the least. Forty-six percent continued to occupy their initial quintile. By the same token, the balance of them moved upwards, but for 25% the movement was only to the immediately next quintile. These movements across quintiles are relative in the sense that your real income can be increasing but, if the incomes of others around you are increasing more, then you could move down into a lower income quintile.

Set against this backdrop, **Table 3** interrogates one important view of absolute income changes in the sample in order to see who succeeded in escaping poverty and who did not. The matrix divides them into four categories: less than the lower poverty line of R515 per person per month, between the lower poverty line and upper poverty line of R949, between the upper poverty line and twice this value (R1 898), and real household income per capita above R1 898.

Of those who were the poorest of the poor in 2008, 70% had not been able to escape this poverty by 2010; of the 30% who were so able, two-thirds of them moved only one category higher, that is, above the lower poverty line and below the upper line. By contrast, there was considerable movement among those originally in the next category (R515-948), with only 31% found there again in 2010. Twenty-eight percent of them climbed out of poverty, yet for 41% the movement was in the opposite direction and saw them enter "deeper" poverty as they fell beneath the R515-per-month threshold. Those in the third category (R949–1 898) experienced a roughly similar movement, with 22% transitioning upwards and 42% moving down (a fifth of them sinking beneath the lower line). In an echo of **Table 2** (where the least movement took place at the top and bottom quintiles), **Table 3** shows that 76% of those initially in the highest category (>R1 898) remained as they were – a figure nearly symmetrical with the 70% in the lowest category who stayed below the poverty line.

In summary, between Waves 1 and 2 the sample experienced positive real income changes on average. However, the distribution of change was very wide, and while there were winners and losers across all groups during a period of notable adversity – a trend which suggests that people's economic outcomes are neither as inevitable nor as intractable as might be assumed – income mobility relative to income quintile and various poverty lines **was largely confined to the mid-income** groups, with correspondingly less mobility being in evidence for the top and bottom groups. Seventy percent of respondents who fell below the poverty line in Wave 1 were again poor in Wave 2; for those who escaped poverty, the distances they covered were short. There has been a reduction in poverty but it is small, especially for those in the deepest poverty.

3. Wealth

Wave 2 of NIDS was the first time in South Africa that a nationally representative household survey obtained sufficient information to calculate individual and household net worth.[2] The fruits of this endeavour represent a major opportunity for expanding knowledge about wealth in South Africa, particularly about the composition and distribution of personal and household wealth. In turn, this store of knowledge holds significant, and ramifying, implications for evidence-based policymaking.

Accruing wealth depends on the acquisition of assets, and while income and expenditure are important in determining an individual and household's current well-being, assets are key indicators of sustainable consumption in the future. Moreover, assets appear to be protective: we found that each additional asset is associated with a 0,2% decrease in the probability of dying between Wave 1 and Wave 2. Acquiring assets is itself dependent on the ability to access credit and the capacity to save, which in turn is a prerequisite for investing. Expected returns on investments vary over time and asset classes. In other words, investments carry risks, so investors generally hedge their bets by diversifying their investment portfolios. Analysing people's composition of assets, especially investment assets, therefore sheds light on how, and to what extent, they insulate themselves from risk by planning for an uncertain future and ensuring later well-being.

Wealth accrual is linked to individuals' asset-acquisition capacities, access to credit, ability to save, diversification options and time/risk preferences with regard to investments. It is also closely related to age, inasmuch as these factors vary over the course of an individual's life-cycle to produce a typical picture that shows a rise in wealth between early adulthood and early middle age, a peak shortly before retirement, and a decline thereafter. Unlike income or expenditure, which can be only positive or zero in value, wealth is a variable reflecting the net financial position of an individual or household at a given point in time. It is usually measured by means of the concept of net worth, which can be defined as the difference between total assets and total liabilities; as such, net worth can be positive and zero, as well as negative if liabilities exceed assets. Hence, people typically have negative net worth in early adulthood as they set about accruing assets such as vehicles and repaying liabilities such as student loans. By middle age they transition into positive net worth; before retirement they reach the peak of their net worth; and after retirement they begin to dissave.

This universally observed pattern is the basis for the life-cycle hypothesis, which predicts that individuals' wealth profiles follow an inverted U-shape as they get older. However, the pattern is negated if they lose the means to earn an income, such as when they are or become unemployed. Unemployment compels individuals to focus on subsistence needs and deprives them of the ability to save. Under these conditions, the net worth of the unemployed will be close to zero and therefore national aggregate wealth accrual will be crucially affected by unemployment.

The discussion above outlines the many areas in which the NIDS Wave 2 instrument can play a role in aiding evidence-based policymaking and provides the context in which our initial thematic findings on wealth in South Africa can be taken further and explored in depth through usage of the rich information contained in the NIDS dataset. As noted, our examination of the data focussed on the composition and distribution of assets and liabilities.

There are six major asset types in the NIDS instrument: real estate, business, retirement annuities, financial, vehicular and livestock. Our key findings are that for poorer households, asset portfolios are concentrated in financial assets; for richer households these portfolios are dominated by real estate assets, except in the case of the wealthiest households, where real estate drops to just over half of all assets and retirement annuities

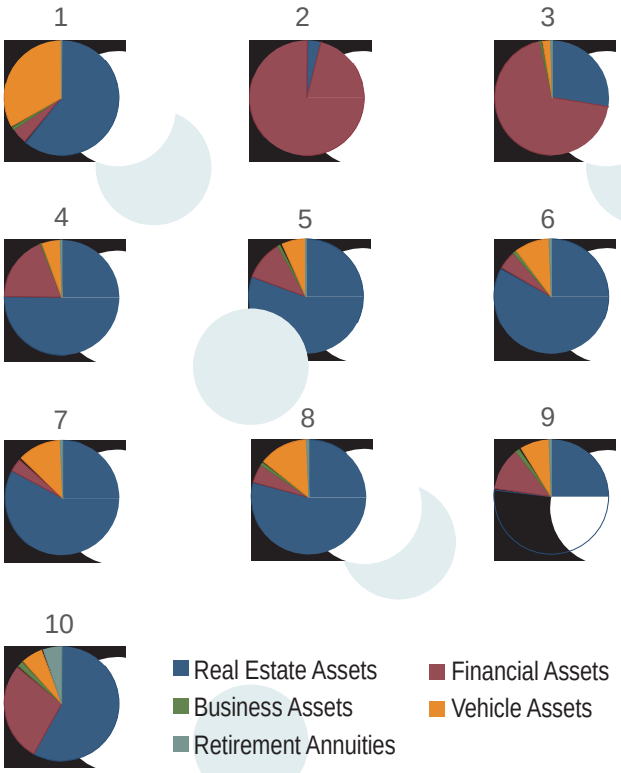


Figure 2: Portfolio of assets by household net worth decile

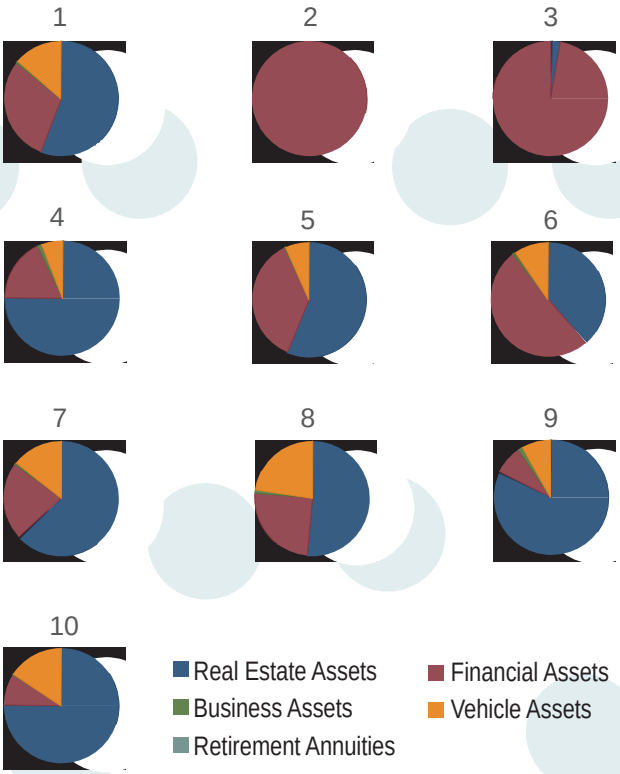


Figure 3: Portfolio of liabilities by household net worth decile

begin to feature with significance in aggregate asset profiles. This suggests that it is only at the top end of the asset distribution that households diversify their assets.

The major liabilities in NIDS are fourfold: real estate debts, business debts, financial debts and vehicle debts. Self-evidently, debts are incurred in order to make purchases; less evidently, they are useful indicators of the types of goods for which households run up their largest debts. Our finding is that the distribution of total debt is highly skewed. Financial debts play an important role for the mainstream of households, and it is only among the wealthiest that real estate debts become dominant, a correlation to be expected in view of the qualifying conditions attached to home loans: individuals who can securitise these debts are likely to be employed and have larger livelihoods than others.

To gain insight specifically into net worth, assets and liabilities need to be combined with one another. Because individuals with high levels of assets can have higher levels of liabilities, resulting in negative net worth, it is useful in addition to compare the composition of assets and liabilities across the net worth distribution. **Figures 2** and **3** present the portfolio of assets and liabilities, respectively, for each net worth decile.

Their most pronounced feature is the shift they demonstrate between deciles 1 and 2. The first wealth decile lies in the negative number line because liabilites exceed assets, but its profile of assets and liabilities is notably different to that of the second wealth decile, in which net worth is positive. Real estate assets and debts constitute more than half of both assets and debts in the first decile, which points to the fact that negative net worth does not necessarily imply that a household is poor. Rather, individuals in the bottom net worth decile are likely to be those with negative equity in their home loans, implying that they

Table 4: Mean and median net worth by age of household head

Age of Household Head	Mean (R'000)	Median (R'000)	Obs.
15–24	137	5	299
25–34	132	4	871
35–44	236	18	1228
45–54	398	20	1324
55–64	267	25	1026
65–74	267	15	611
75 and above	274	32	390

qualify for a home loan and therefore are most likely employed. Poorer households are unlikely to qualify for home loans, and we see that in the second and third net worth deciles. Therefore, an important transition occurs between these deciles.

Table 4 presents the distribution of mean and median net worth by household and age, and uses the age of the household head as a basis for assigning households to age cohorts. Households with the lowest mean net worth fall in the 15–24 and 25–34 cohorts; net assets build up in the next three cohorts, before declining for those entering retirement at 65 and rising again after 75 and older. A similar pattern unfolds for median net worth. The data are thus in alignment with the life-cycle hypothesis discussed earlier – but for one apparent discrepancy, namely that the median household does not dissave in retirement but actually increases its stock of assets. This is a predictable feature of the life-cycle hypothesis if one accounts for a bequest motive in the financial plans of the aged, and further analysis of this trend should be a priority.

In summary, the Wave 2 instrument stands to play a valuable role in informing evidence-based policymaking, given the data it obtained about household net worth particularly. Wealth accrual is a complex, multi-factorial process that generally describes a pattern of rise and decline in the course of individual life-cycles but is adversely affected by unemployment: the NIDS dataset can be usefully explored to gain deeper understanding of this process. **Initial findings are that household asset portfolios are largely defined by the** presence or absence of housing, that the distribution of total debt is skewed, that limited access to credit and high unemployment is a likely barrier to home ownership, and that those who do have **access to home loans form a significant** part of the lowest wealth decile. Wealth over the age distribution shows a non-linear trend, suggesting a bequest motive **in the financial behaviour of the aged.**

4. Subjective Well-being

Data collected by NIDS offers a unique opportunity for assessing economic well-being in South Africa in enriched, multifaceted ways.[3] Over and above the fact that it is a longitudinal study, NIDS augments income, asset and wealth measures for South Africa with information about individual panel members' subjective, self-assessed well-being. Moreover, data of this kind were obtained in both Wave 1 and Wave 2, making it possible to explore changes in subjective measures over time by correlating them with changes observed in other categories of data. The result is that NIDS is capable of providing a more holistic, penetrative reading of well-being and quality of life than hitherto has been possible.

Most national household surveys generate statistics on poverty and inequality by gathering data on money-metric measures of well-being such as income and expenditure. While NIDS does this too, these measures could be limited in at least two ways. First, they are usually not able to identify differences in material well-being in households where resources are not shared equally; second, given that an array of factors will affect an individual's quality of life, these "cash and consumption" measures on their own capture only a single dimension of economic status in particular and of well-being in general.

Although NIDS is not the only national household survey in South Africa that has sought to redress these limitations by including questions about subjective well-being, other such surveys have posed their questions at the household level, thereby inviting the respondent to answer on behalf of the household as a collectivity. These questions rest on two problematic assumptions – first, that the respondent is willing and able to report accurately on the household's level of satisfaction, and, second, that the household enjoys a unified and identical state of well-being among all its members. What makes NIDS distinctive is that it frames its question at the level of the individual, a strategy which enables it to circumvent the difficulties associated with questions posed at household level.

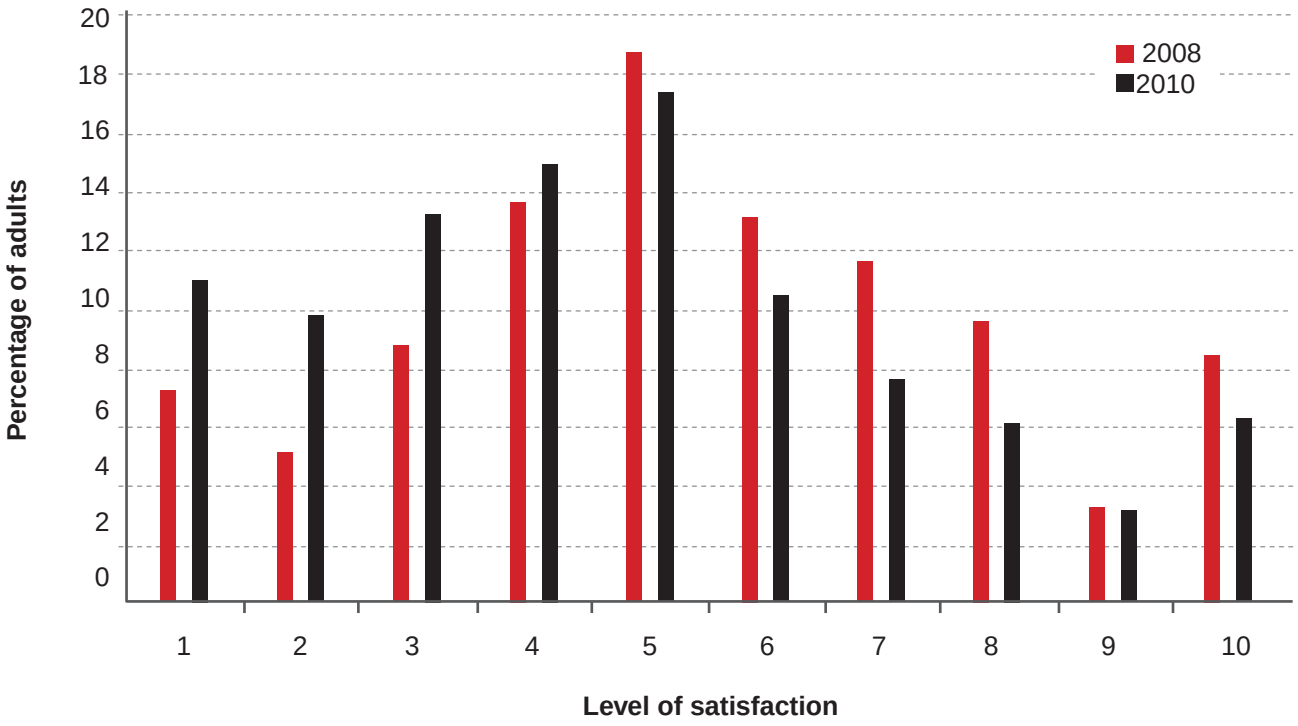


Figure 4: Subjective well-being among adults

Table 5: Percentage anticipated upward mobility

	2008 (%)	2010 (%)
African	76	48
Coloured	71	57
Indian	73	60
White	38	45

Our exploratory statistics engaged with the dataset along three lines of enquiry: we looked at life satisfaction, perceived economic status and expectations of upward mobility. Initial findings were as follows:

More than half of the resident adults were less satisfied with their lives in 2010 than in 2008, with Africans being much more likely than whites to report lower satisfaction.

About two-thirds of adults did not perceive an improvement in their economic ranking in the period, though evidence suggests that individuals underestimate their relative positions.

Expectations of future upward mobility declined considerably among adults, and especially among Africans.

These subjective assessments appear to be interlinked, inasmuch as people who think they are richer than others, and who anticipate ranking higher in the future, will be much more satisfied with their lives.

Figure 4 elaborates on the first group of findings by comparing subjective well-being in 2008 and 2010. The distribution has clearly shifted negatively in this period, with a higher percentage of adults who report being dissatisfied and lower number who report being satisfied. The distribution is also marked by racial cleavages (not shown in this figure). The modal level of satisfaction among Africans was 5; among whites, it was 8. Race differences widened in the two-year period, so although both whites and Africans reported lower satisfaction in 2010, the decline was notable among Africans: 55% reported a satisfaction level of 4 or lower, compared to 42% in 2008. The comparable figures for whites are 11% (2010) and 8% (2008).

Regarding the second group of findings about self-perceived economic status, whites were more likely than Africans to perceive their economic status as having stayed unchanged between Waves 1 and 2; Africans were more likely to view it as having declined. In 2008 and 2010, more than half of the adults in the sample (54% and 52%, respectively) thought they ranked among the poorest third of South Africans. This is a logical impossibility (not every person in the 54% or 52% could literally be in a category reserved for 33,3% of the population), and it indicates that a sizeable group of people are better off in reality than they think are.

That being said, poor adults are not necessarily always wide of the mark in their self-assessment; indeed, those who actually were the poorest of the poor showed they were presciently in touch with reality. In a comparison of objective income rank with subjectively-perceived economic rank, large divergences between the two were evident. For example, only 6% of adults among the richest third believed themselves to be on the uppermost economic rungs. The largest correspondence in income rank and perceived economic rank was among adults in the bottom third of the income distribution.

A striking inter-wave change in the responses to questions about perceived status concerns expectations of future mobility. In 2008 almost three-quarters of adults anticipated being on a higher rung in two years' time; by 2010, this had fallen to 50%. As **Table 5** shows, expectations of upward mobility declined, particularly among Africans (from 76% to 48%). Only whites buck the trend: their expectations did not decline in the two-year period, and seem to have increased slightly.

In summary, NIDS is unique in South Africa in augmenting conventional income measures with subjective measures of **well-being specifically framed to elicit data** at the individual rather than household level and thereby produce a more rounded picture than usual of economic well-being and quality of life. Initial interrogation of the NIDS data reveals that levels of **life-satisfaction declined significantly** between 2008 and 2010 and that about two-thirds of adults did not perceive their economic situation to have improved in this time. However, the gulf between self-perception and objective income rank is wide, most notably at the top end of the income scale; the gulf is smallest for the poorest. Expectations of upward mobility were dramatically lower in 2010 than in 2008, especially among Africans.

5. Labour Market

The previous sections of this report outlined key introductory findings made in the thematic areas of income mobility, wealth and subjective well-being; in the present section, the report looks at labour market outcomes and transitions (and thereafter turns to education and health).[4] The order of play is not coincidental or entirely a matter of convenience. While income changes and distributions of net worth involve the cold currency of material well-being, measures of subjective well-being help shed light on the "warmer" issue of how individuals evaluated these trends and registered their impact. Similarly, those first three thematic areas can be read in broad juxtaposition with the second trio of themes, the emphasis falling on the qualifier "broad".

All six of them are, clearly, intertwined and mutually implicating, such that a change in one area is as likely to be a cause of a change in another as it is likely to be a consequence of it. For instance, a decline in health could see a decline in income status; reduction in income status could likewise initiate a deterioration in health. Nevertheless, the next three thematic areas may be read – broadly – as "drivers" of the first three. However nuanced the processes are, there can be little doubt, for example, that a move into or out of employment will yield a change in income and carry repercussions for wealth accrual and subjective well-being.

In this section, then, we report the key initial findings of our examination of three categories of change in labour market outcomes: changes in employment status, in employment type, and in industry of employment. We also briefly consider another kind of movement, this time a literal one: we found differential outcomes for those who packed up and moved residence and those who stayed.

Employment status

In terms of shifts in employment status, 51% of adults aged 20–55 were employed in 2010, an overall decrease of 2,2% on the employment level for 2008.[5] As **Table 6** indicates, the hardest-hit group were those aged 46–55, who experienced a 9,9% decline in employment. The decline was similar for men and women (2,1% and 1,9%, respectively), and all races underwent a drop in employment. This decline was especially marked for coloured (5,7%) and Indian respondents (7,7%); for Africans it was 1,6%, and for whites, 2,1%. In 2010, 4,3% more people aged 20 to 25 were employed than in 2008.

The figures in **Table 6** are based on the employment status of our sample in 2008 and 2010 irrespective of what an individual panel member's status was in 2008. Thus, while these figures offer a useful cross-sectional view of employment levels and change-rates between Waves 1 and 2, they do not convey the changes undergone over time at the individual level or register which of the same people entered or exited employment over the two-year period. To do so, it is necessary to make use of NIDS's capabilities for longitudinal tracking and take into account respondents' initial state in Wave 1.

Table 6: Employment status – levels and changes between 2008 and 2010

	Percentage in each category in 2010	Change in percentage between 2008 and 2010
Aggregate	50,8	-2,2
African **Coloured** **Indian** **White**	47,7 59,0 58,7 72,8	-1,6 -5,1 -7,7 -2,1
Male **Female**	63,1 42,2	-2,1 -1,9
Age 20–25 **Age 26–35** **Age 36–45** **Age 46–55**	39,6 54,6 58,5 47,6	4,3 -0,2 -5,2 -9,9

Table 7: Employment type – levels and changes (cross-sectional view)

		Percentage in each category in 2010				Change in percentage between 2008 and 2010		
		i	**ii**	**iii**		**i**	**ii**	**iii**
	# of obs.	Regular Emp.	Self-emp.	Casual Emp.		Regular Emp.	Self-emp.	Casual Emp.
Aggregate	3 106	80,3	12,2	7,5		5,5	-2,4	03,1
African	2 346	79,9	11,2	8,8		7,0	-4,3	-2,7
Coloured	556	85,7	7,6	6,7		-1,8	4,5	-2,7
Indian	40	66,6	30,6	2,8		6,4	11,2	-17,6
White	163	81,5	17,8	0,6		0,5	1,8	-2,4
Male	1 459	80,3	11,0	8,7		3,8	-0,7	-3,1
Female	1 647	80,2	13,5	6,3		7,4	-4,3	-3,0
Age 20–25	548	79,3	10,2	10,5		7,9	2,6	-10,5
Age 26–35	941	83,0	9,8	7,2		5,2	-2,9	-2,3
Age 36–45	971	80,0	13,7	6,3		3,4	-1,1	-2,3
Age 46–55	646	76,2	16,4	7,4		6,4	-5,7	-0,7

The findings here are that, of those employed in 2008, 28,5% were no longer in employment in 2010. The 71,5% who remained employed were joined in turn by people who, in 2008, were not employed and who previously fell into one of three subcategories: "searching unemployed" (that is, active work-seekers); "discouraged unemployed" (people who would have liked to work in the past four weeks but have not actively searched for work); and "NEA" ("not economically active", meaning those, such as students or home-makers, who are not employed and do not want to find employment).

Twenty-two percent of individuals who were NEA in 2008 were employed in 2010, as were 28,7% of discouraged unemployed and 32,3% of searching unemployed.

There was thus considerable movement across employment categories. In overall terms, 45% of individuals changed their employment state between 2008 and 2010; conversely, 55% were in the same state in both years. What these findings suggest is that although particular employment categories might be considered relatively stable states, they are not overly stable. More specifically, the findings demonstrate that the aggregate drop in employment of 2,2% – apparently small in itself – masks a welter of movement inside the sample group. These patterns are notable for their gendered dimension. For example, the employment participation rate is much lower for women than men (50,8% versus 42,2% in 2010), while women experience greater mobility across employment status: 50% of women changed employment status compared to 45% of men.

Employment type

Table 7 provides a cross-sectional view of changes in the labour market outcomes among those who were employed in regular employment, self-employment or casual employment in both 2008 and 2010. A shift can be seen out of self-employment and casual employment and into regular employment, the exit from self-employment being strongest for females and workers aged 46–55.

Table 8 is a dynamic view of transitions across types of employment. Casual employment is clearly a transitory state, given that only 14% of the casual workers from 2008 remained in this type of employment in 2010. Self-employment is also much less stable than regular employment, with 28% of the formerly self-employment crossing over to regular employment in 2010. Together, these data suggest that – to the extent that the original source of employment was still available to them – the individuals chose regular employment over self- and casual employment.

Analysis of changes in earnings according to type of employment transition demonstrates the benefits of regular employment. On the one hand, 70% and 65% of those moving, respectively, from regular employment to self- or casual employment saw losses in their earnings. On the other hand, an even greater percentage of those moving from self-employment (84%) or casual employment (85%) experienced gains in earnings, the mean and median gains being large in size.

Table 8: Employment type – changes (longitudinal view)

		Type of Employment in 2010		
		Regular Employment	**Self Employment**	**Casual Employment**
Type of Employment in 2008	Regular Employment	92,7	3,7	3,7
	Self Employment	27,8	64,3	7,9
	Casual Employment	66,1	19,1	14,1

Employment industry

Roughly a quarter (22,8%) of regular wage workers changed industry category between 2008 and 2010. The exodus from employment in the secondary sector (manufacturing; electricity, gas and water supply; and construction) was prominent, with only 38,1% found again in this sector in 2010. By comparison, 89,8% of respondents remained in the tertiary sector (a category including retail and wholesale trade, as well as transport, storage and communication). The decline in secondary-sector employment appears to be driven by a decline in total employment in manufacturing.

Most of those moving out of employment in the primary sector (agriculture, fishing, mining, hunting, forestry and quarrying) enjoyed median earning gains but on average experienced losses. The median gain for those moving from secondary to tertiary sectors was R488.

Movers and stayers

Of the balanced sample of 21 069 individuals[6], 1 793 reported that they had moved between Wave 1 and Wave 2; of these movers, 389 moved to a new province while the balance remained in the same province as in Wave 1. One of the key motives in the decision to move is to increase access to the labour market and wage income. As such, we interrogated the survey data to see what impact moving or staying made on labour market outcomes, placing the focus on individuals between the ages of 25 and 60 in Wave 2.

Succinctly put, movers were more successful than stayers in finding work and keeping it. Of those who were discouraged, or non-searching, unemployed in Wave 1, 56% of movers compared to 24% of stayers had a job, come Wave 2. Of those who were searching unemployed in Wave 1, 42% of movers compared to 31% of stayers were employed in Wave 2. Movers, it appears, had far better prospects of securing employment than stayers; they also fared moderately better when it came to remaining in an employed state. Of those who were employed in Wave 2, three-quarters of movers compared to 71,6% of stayers were still employed in Wave 2.

In summary, labour market outcomes (as well as matters of education and health) can be read broadly as "drivers" of income mobility, wealth accrual and subjective well-being, although it must be borne in mind that economic processes are intertwined with one other, **making it difficult to draw hard and fast** distinctions between "the drivers" and "the driven". Initial investigation into the NIDS Wave 2 dataset produced a split-image of changes in employment levels. Viewed cross-sectionally, the employment level showed an overal decline in the two-year period. When the data is viewed longitudinally, a welter of movement becomes apparent beneath the small decline. About a third of individuals who were employed in **2008 were out of work in 2010; a fifth of** the NEA in 2008, and a third of searching unemployed, took up employment.

The majority of casual workers from 2008 changed employment type, and nearly a third of the self-employed crossed over to regular employment, with most of them seeing earnings gains. Roughly a quarter of regular wage workers changed to a different industry, and there was a marked exodus from secondary industry, probably due to a decline in the manufacturing sector. People who moved residence in search of opportunity fared **significantly better than stayers in finding** work and remaining in employment between Waves 1 and 2. This trend is a fertile area for investigation.

6. Education

The NIDS Wave 2 dataset provides the first longitudinal information ever collected on education in a national household survey in South Africa.[7] NIDS is also the first study of this kind to contain detailed questions about post-schooling shifts into the labour market. Using Wave 2 data, we can assess the changes in rates of grade progression, repetition and dropout between 2008 and 2010 and examine what respondents do when they leave school. NIDS Wave 2, in other words, enables one to study transitions across grades, and transitions in and out of school, in ways which have never before been possible. As such, our introductory analysis of the data focussed on progress through school and into work; we also examined access to schools and targeting of school funding.

Progress through school and into work

In overview, the initial findings are that progress through school is slow. There are high rates of grade repetition throughout the grades, dropout increases systematically from grade 7 onwards, and few youth successfully complete matric, with even fewer pursuing alternative vocational study. On the other hand, exiting the school system offers scarcely better options: most of the respondents who were in grade 12 in 2008 were not employed or studying further in 2010.

The list below unpacks this synopsis in more detail:

- Females have higher pass rates than males in every grade.
- Rates of grade repetition are high in all grades, becoming higher in secondary school.
- Retention rates are high until secondary school: dropout is negligible in grades 0–7 but increases year-on-year thereafter.
- Beginning in grade 6, dropout rates are higher for males than females.
- Between 65% and 80% of individuals progress successfully through grades until the end of grade 9. In grade 9 there is a large increase in the proportion of individuals repeating grades and in the proportion that are not enrolled at school. Of those who were in grade 9 in 2008, only 43% had progressed optimally (that is, by two grades) in 2010; 30% of them repeated at least one grade, and the balance left the schooling system.
- Of those who left the schooling system, 85% were neither studying nor working, 12% were working, and 3% were in post-school education.
- Females progress through school faster than males and are also more likely to further their post-schooling education. However, they are less likely than males to find employment.

Access to schools and school funding

Post-apartheid education policies aim to furnish all learners with high-quality education and seek to achieve this by, inter alia, improving access to education and redressing inequalities in school funding. Schools are assigned to quintiles based on the income, employment rate and education level of their neighbourhoods. They are then allocated budgets according to quintile ranking, with lower quintile schools receiving larger allocations per learner than higher ones; schools in quintiles 1 and 2 – "no-fee schools" – may not charge fees, but are compensated by the state.

Against this backdrop, we investigated access to schools and assessed school outcomes. We can do this because we have worked with the Department of Basic Education to combine some of their data about schools, including locations and their quintile rankings, with the NIDS data. The overall finding is that education policies are successfully targeting the poor in terms of spatial

access and funding, but that the school choices of poor learners are restricted and the basis of the quintile system is open to question.

Most individuals were found to have a school within one kilometre of their household. The wealthier, however, have a wider choice in schooling and travel further to attend schools of their preference. Only a minority of individuals attend their closest school, though most do attend a school located within two kilometres of it. Those who decide not to attend their closest school, pick schools in the higher quintiles and ones that are less likely to be no-fee schools as well as more likely to have lower pupil-teacher ratios.

What this suggests, especially in the case of poor learners, is that despite the relative ease of spatial access to schools, households are often not only prepared to have learners travel greater distances in order attend schools of perceived higher quality, but are willing to forfeit the school-fee exemption to which they might otherwise have been entitled had the learners gone to the closest school, this in addition to incurring fees at the school which is actually attended. In short, many households appear to be valuing educational quality, real or perceived, over costs incurred or costs that could potentially be avoided. Given the wider choices in accessible "quality" schooling that are available to wealthier households, such households will find it comparatively easier to advance their educational aspirations than poorer households, which face a more restricted range of choices. The analysis of the data, in other words, points to enduring inequalities in the satisfaction of educational aspirations.

In relation to school funding, we compared respondents' socioeconomic characteristics with the school quintile of their closest school and found that schools with the lowest quintile status have learner populations from the poorest households. School funding is therefore accurately targeted to poor neighbourhoods. However, the neighbourhood characteristics of quintile 1, 2 and 3 schools are similar in terms of income, employment and education; in other words, it is not clear that those in quintile 2, even 3, schools are significantly less disadvantaged than those in quintile 1 schools. This finding raises some questions about the basis of school funding, as it suggests that in these cases the quintile system assumes a distinction between the socio-economic status of learners that does not seem to be an accurate reflection of the reality on the ground.

In summary, NIDS Wave 2 provides longitudinal information about individuals' transitions across school grades and into post-schooling life. The study found high rates of grade repetition, a steady increase in dropout from grade 7 onwards, and low completion rates. **Eighty-five percent of those in grade** 12 in 2008 were neither employed nor studying in 2010. Compared to males, female learners have higher pass rates, lower dropout rates, and are more likely to complete their schooling and study afterwards; they are, at the same, less **likely than males to find employment.** Education policies are successfully targeting the poor in terms of spatial access and funding, but the school choices of poor learners are restricted and the basis of the quintile system is in doubt given that few differences could be discerned in the socioeconomic makeup of learners associated with schools in quintiles 1, 2 and even 3.

7. Health

NIDS panel data hold great potential for deepening knowledge about the relationship between health status and socioeconomic status in South Africa.[8] Our preliminary investigation into the Wave 2 survey data examined the following: mortality, chronic conditions and health-related behaviours; births; obesity among adults; and malnutrition among children. The key early findings are discussed in the category subheadings below.

Mortality, chronic conditions and health-related behaviours

- The weighted mortality rate in the sample is 2,9%.
- Deaths are disproportionately concentrated among very young children and older people. The mortality rate decreases after early childhood and shows a roughly linear increase from age 15 and after; however, consistent with other South African datasets, it exhibits a hump between ages 20–40 most likely due to deaths associated with the AIDS pandemic.
- Africans have the highest mortality rate, followed successively by coloureds, whites and then Indian/Asians.
- Reporting any chronic conditions in Wave 1 roughly doubles a person's risk of dying by Wave 2 .
- Smokers in Wave 1 were significantly more likely than non-smokers to be dead by Wave 2.

Births

- Three-quarters of births were to women aged 30 and under; about a quarter (23%) were to teen mothers.
- Most children (74%) do not live with their fathers, who are usually absent rather than deceased. Rates of paternal absence vary strongly according to the mother's age at birth and to rural/urban location. Almost all children (98%) born to teen mothers have absent fathers. In urban areas, two-thirds of children have absent fathers, and, in rural areas, 80%.
- Children born to older mothers are more likely to be underweight at birth, whereas those born to teen mothers are 11,5% *less* likely to be so. Children born to mothers in urban areas and to those in the relatively wealthy fourth income quintile have a significantly high risk of being born underweight; low birth weight also seems to be associated with higher levels of maternal education. The relationship between low birth weight and socioeconomic status appears complex and warrants further exploration.

Obesity among adults

- The overall obesity rate rose from 6,4% to 8,7% for men and from 27,6% to 32% for women.
- The data show considerable transition into and out of obesity, with only 3% of men and 21% of women classified as obese in both Wave 1 and Wave 2. Those who experienced the transitions were generally younger, which suggests that the change is due to increases in height.
- The age-BMI (Body Mass Index) shifted upwards in the two-year period. Levels of obesity are higher for women than men at every age; so, too, is the proportion of them who become obese at each age. For women, the upward shift is pronounced between ages 12–20. Unlike female obesity, male obesity shows no rural-urban differences, and race differences are not as marked for men as they are for women.

Malnutrition among children

About 9% of children aged 6 months to 14 years were classified as stunted in both Waves. They are classified as such if their height-for-age z-score falls two or more standard deviations below the WHO (World Health Organisation) reference population. Around 12% of children who were not-stunted in Wave 1 were stunted in Wave 2, but, surprisingly, about half the children who were classified as stunted in Wave 1 were no longer classified as stunted in Wave 2.

Although a degree of measurement error may be possible, there are good reasons for attributing

the majority of these cases of reversed stunting to plausible changes in the child's height. Further analysis explored the hypothesis that female eligibility for the state old-age pension yields improved nutritional outcomes for children. Our finding was that children in households that got the pension between Waves were 9% less likely to be stunted in Wave 2. Conversely, children who lived in households that had previously received the pension but had then lost it through a change in domestic circumstances after Wave 1 were 14% more likely to be stunted in Wave 2.

In summary, NIDS data can improve knowledge about the interrelationships between health and socioeconomic status. The mortality rate is high among very young children and older people, and shows a hump between the ages 20-40 that is most likely due to AIDS-related deaths. There are high rates of paternal absence, and almost all children born to teen mothers do not live with their fathers. We found that it is older mothers rather than teens that have a higher likelihood of giving birth to underweight children; the relationship between maternal socioeconomic status and the child's risk of low birth weight should be further investigated. The obesity rate rose for both men and women, and greater numbers of women are becoming obese at each age group. Around half of the children who were stunted in 2008 appear to have reversed their stunting, with the majority of the changes plausibly attributable to changes in height. Children who were stunted in Wave 1 were 9% less likely to be stunted in Wave 2 if their household began receiving a pension in this period; children whose households lost the pension were 14% more likely to become stunted.

8. Data Quality

As with any other survey data, NIDS data are vulnerable to measurement error. Scrupulous technical checks are undertaken to ensure the reliability of our data, and the longitudinal dimension of NIDS provides it with an in-built capacity for self-correction: variables which are poorly answered in earlier Waves can be revisited in later ones. By the same token, though, longitudinal studies are prone to the problem of attrition, which arises when respondents from previous surveys are no longer able or available to continue as members of the "panel" because they have died in the interim, cannot be located or refuse to participate anymore in the study.

Two notes of caution must be sounded in this report, then, as they are directly relevant to certain of the key initial findings that we report.

The first is that the data show a dramatic decline in unemployment, in particular a large – and unexplained – reduction in the number of individuals in the "searching unemployed" category. Although there is not an exact comparison available in published StatsSA documents, their statistics do not indicate a similar trend and there is no reason to expect this decline in the searching unemployed to be accurate. Instead, the distribution of results suggests that some of the searching unemployed were not correctly classified by fieldworkers in the Wave 2 fieldwork. The NIDS team is addressing this directly in the training for the Wave 3 fieldwork. Given these concerns, our discussion of the labour market has focused on the rate of employment rather than the rate of unemployment.

The second note of caution is that while the overall attrition rate for the sample was a passable 21%, the attrition rate in income deciles 9 and 10 was 28% and 42%, respectively; and the attrition rate for better-off white South Africans was 53%, compared to 19% for Africans. There is hence a risk that the analysis of income changes between 2008 and 2010 will not provide an accurate picture of changes for those who were at the top end of the Wave 1 income distribution. This problem of

lower response rates and higher attrition rates for those at the top end of the income distribution is found in all South African and most international surveys. The advantage of a panel survey is that the survey operation can update address and contact information between waves, even for those who did not respond in Wave 2. NIDS has an extensive, ongoing operation that does this. By keeping in contact with its panel members and informing them of upcoming survey work, there is a strong chance of reclaiming for the panel a number of those who did not respond in Wave 2.

List of Wave 2 Discussion and Technical Papers

Discussion papers

No.	Topic	Author
1	Labour	Paul Cichello, Murray Leibbrandt & Ingrid Woolard
2	Subjective well-being	Dorrit Posel
3	Health	Cally Ardington & Boingotlo Gasealahwe
4	Education	Nicola Branson, David Lam & Linda Zuze
5	Income mobility	Arden Finn, Murray Leibbrandt, James Levinsohn
6	Wealth	Reza C. Daniels, Arden Finn & Sibongile Musundwa
7	Child Grants	Ingrid Woolard and Thabani Buthelezi

Technical papers

1	National Income Dynamics Study Wave 2 User Manual	Michael Brown, Reza C. Daniels, Louise De Villiers, Murray Leibbrandt and Ingrid Woolard (eds)

Public Access to Data

Preserving anonymity in the data

It is the responsibility of the NIDS team to ensure that respondent identities are protected. During the interviews, information was collected that will enable tracking and re-contact of respondents for subsequent waves of data collection. However, some of this information is excluded from the public release dataset so as to preserve the anonymity of the respondents.

Data structure

NIDS uses a combination of household and individual level questionnaires. The data from the different questionnaires are recorded in separate files. The files are flat files with one row per record (individual or household). The data can be exported into most standard statistical packages. A set of files is released for each Wave, but they can be combined across waves using the unique identifier for the individual, variable name "pid".

Downloading the data

The NIDS data can be downloaded from the DataFirst website:

http://www.datafirst.uct.ac.za/dataportal/index.php/catalog/452.

The steps to follow to gain access to the data are:

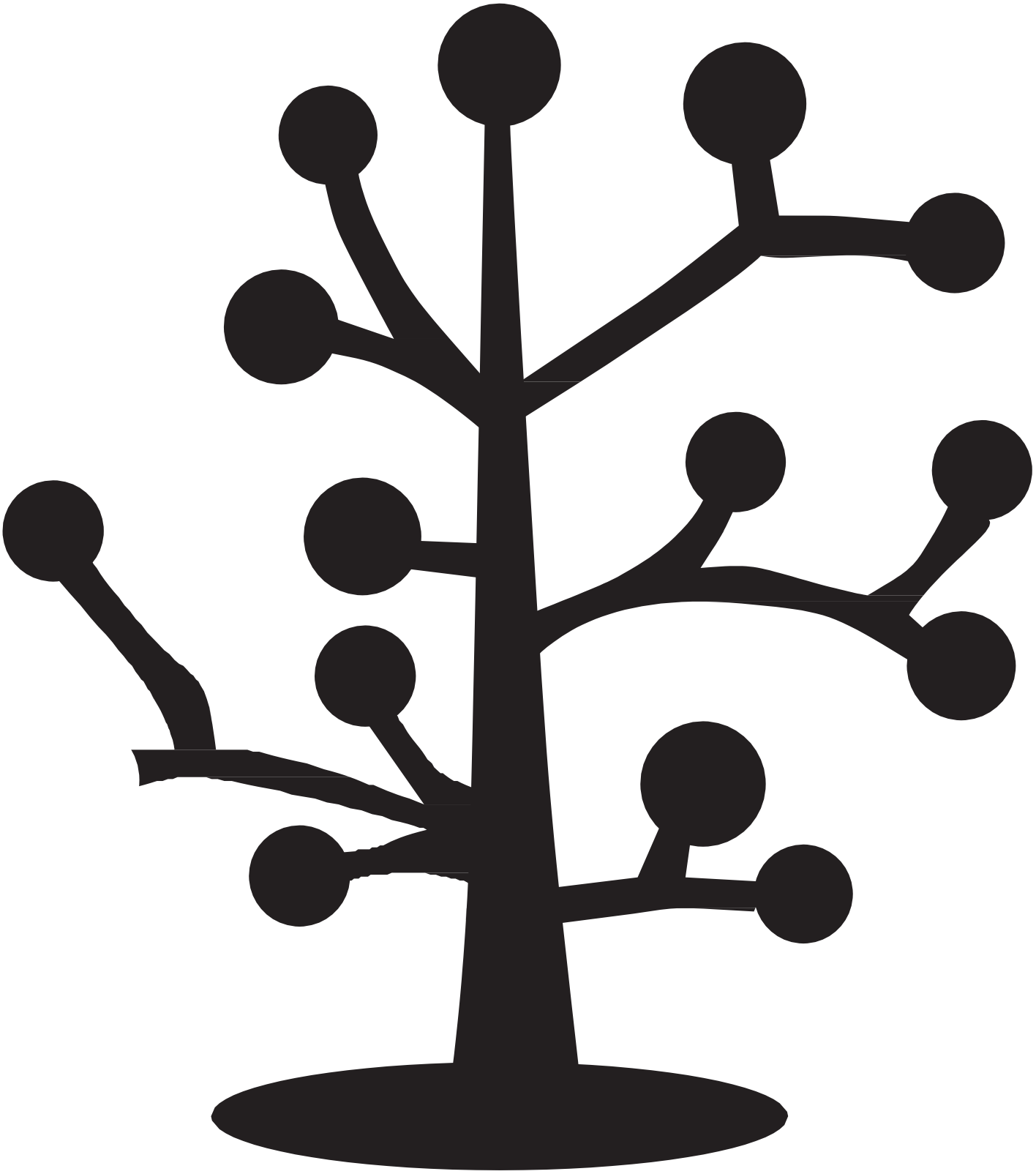
- **Step 1:** Register as a user on the DataFirst website. Once you have registered on the DataFirst website, the registration details can be used to access datasets from the site.

- **Step 2:** Complete a short online Application for Access to a Public Use Dataset for the NIDS datasets. On the form you will need to provide a short description of your intended use of the data. The information provided here helps us to understand how NIDS data is being used by the research community. The form also asks you to agree to Terms and Conditions related to the use of the NIDS data.

Endnotes

1. This thematic sub-report derives from Discussion Paper 5.
2. This thematic sub-report derives from Discussion Paper 6.
3. This thematic sub-report derives from Discussion Paper 2.
4. This thematic sub-report derives from Discussion Paper 1.
5. The discussion focuses on employment rates rather than unemployment rates. For an explanation of this decision, see the section "Data Quality".
6. The balanced NIDS sample is the sample of individuals that participated in the survey in both Wave 1 and Wave 2.
7. This thematic sub-report derives from Discussion Paper 4.
8. This thematic sub-report derives from Discussion Paper 3.

Notes



The National Dynamics Study (NIDS) is the first national panel study of individuals of all in South Africa. main e is to measure and under getting who is f South Africa, as well as why people are making progress and others

Wave 1 of the NIDS survey took place in 2008 and provides the baseline on the well-being of 28 247 sample members in 7 301 households against which to measure all future changes. The next held in 2010. Successful interviews were obtained for 6 809 households, with a total of 28 641 household residents successfully intervie .

This document reports on introductory findings from the Wave 2 dat The findings are preliminary and to demonstrate the ways in which the NIDS dataset can be used to standing of the African socioeconomy. It is hoped, ther ore, that it will simulate public debate and encourage further investigation by the r ch community.

N.i.D.S.
NATIONAL INCOME DYNAMICS STUDY

Design: http://www.rothko.co.za