# UNIVERSITY OF THE WESTERN CAPE

## DEPARTMENT OF ECONOMICS

# LABOUR MARKET TRENDS SINCE THE ADVENT OF DEMOCRACY, WITH A SPECIFIC FOCUS ON GENDER ISSUES

by

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**DECLARATION**

I declare that *LABOUR MARKET TRENDS SINCE THE ADVENT OF DEMOCRACY, WITH A SPECIFIC FOCUS ON GENDER ISSUES* is my own work, that it has not been submitted for any degree or examination in any university, and that all the sources that I have used or quoted have been indicated and acknowledged by complete references.

**Sayed Obonye Mboki Timuno**

Signature: S. O. M. Timuno.

Date: 13 May 2011

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# ABSTRACT

The transition of South Africa's political system from an apartheid administration to a democratic rule in 1994 resulted in the end of years of international sanctions imposed on the country. This move placed the country back on the global trading market. In addition, improvements in living conditions, education attainment, and labour market outcomes of societal groups who were previously disadvantaged by the apartheid administration were expected. Looking at the labour market in greater detail, government devised policies aimed at addressing, amongst others, the racial and gender inequalities in job access and remuneration as well as improving the employment conditions. Despite these attempts, women have been known to be subjected to different kinds of discrimination. As a result, they have been segregated, and in most case were over-represented in low income, less secure employment as well as over-represented in the unemployed pool of the labour force.

Numerous South African studies in the past only derived the "trends" labour market activities by gender since the transition by comparing the 1995 October Household Survey (OHS) with the latest available Labour Force Survey (LFS), without taking into consideration the comparability issues of the datasets. Hence, this thesis uses all the South African labour survey data in 1995-2009 to investigate the trends in the performance of each gender in the labour market since the transition, specifically looking at the following: labour force participation likelihood, employment likelihood, remuneration and working conditions of the employed, characteristics of the unemployed, as well as whether gender discrimination in the labour market (with specific focus on employment probability gap and wage gap) still exists since the advent of democracy.

**KEYWORDS:** South Africa, Household survey, Labour market trends, Labour force participation, Employment, Unemployment, Gender, Female, Discrimination.

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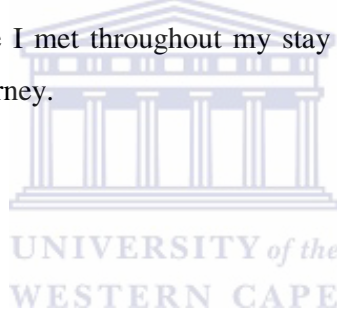
Thank you all and God Bless!!!

# TABLE OF CONTENTS

# LIST OF ABBREVIATIONS

AGR        Actual growth rate

ASGISA     Accelerated and Shared Growth Initiative of South Africa

EAP        Economically working population

EAR        Employment absorption rate

GDP        Gross domestic product

GEAR       Growth, Employment and Redistribution

LF         Labour force

LFPR       Labour force participation rate

LFS        Labour Force Survey

OHS        October Household Survey

OLS        Ordinary Least Squares

QLFS       Quarterly Labour Force Survey

Stats SA   Statistics South Africa

TGR        Target growth rate

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# LIST OF TABLES

# LIST OF FIGURES

# CHAPTER 1    INTRODUCTION

## 1.1    Introduction

The transition of South Africa's political system from an apartheid administration to a democratic rule in 1994 resulted in the end of years of international sanctions imposed on the country. This move placed the country back on the global trading market. However, from the time that the transition began in 1994, the Mandela administration was faced with various economic and social challenges, one of which was a labour market characterized by inequalities, discrimination and high unemployment rates (Burger and Woolard 2005). In addition, improvements in living conditions, the attainment of education and the labour market outcomes of societal groups that previously were disadvantaged by the apartheid administration were expected. In this regard, government devised policies aimed at addressing, amongst others, the racial and gender inequalities in job access and remuneration, as well as improving employment conditions. The administration also recognised that employment was an essential policy objective for attaining a high standard of living, reducing poverty and creating jobs. Therefore, the Growth, Employment and Redistribution (GEAR) strategy was introduced in the last few years of the 1990s. Job creation was to be achieved through a combination of various policies that aimed at achieving higher levels of flexibility and productivity, as well as cutting labour costs, thereby encouraging economic growth that was to be complemented by employment creation. In addition, the Accelerated and Shared Growth Initiative of South Africa (ASGISA), implemented since the early years of 2000s, as well as the New Growth Plan, to be implemented in 2012, also have job creation and improvement of labour market conditions as some of the main policy objectives.

Despite these noticeable attempts to improve labour market conditions, women have been known to be subject to different kinds of discrimination, whether intentionally or unintentionally. Hence, as coping strategies, various pieces of labour legislation have been enacted since the end of the apartheid regime. These laws aimed at promoting equal opportunities and fair treatment in the labour market, and were mostly targeted at the previously disadvantaged groups, i.e., women, non-Whites, and people with disabilities. In addition, these labour market laws aimed to reduce discrimination and social injustice, as well as advance economic development, by establishing and enforcing basic conditions of employment (Goga, Oosthuizen and Van der Westhuizen 2007).

Since 1994, the newly elected African National Congress (ANC) has redrafted the South African Constitution and enacted numerous items of labour legislation, such as the Labour Relations Act[1], the Basic Conditions of Employment Act[2], the Employment Equity Act[3], the Affirmative Action[4] and the Skills Development Levies Act[5]. In general, these policies aim at overcoming racial and gender inequalities in both job access and pay, including the improvement of conditions of employment. However, despite these aggressive measures, the female labour force remains highly disadvantaged. In this regard, women have been over-represented in low-income, less secure employment, as well as over-represented in the unemployed pool of the labour force (Goga et al. 2007). These recent findings motivate the main research question of this thesis: how has the female labour force fared since the fall of apartheid in South Africa?

Statistics South Africa (Stats SA) has improved the availability and quality of information on the South African labour market by transforming their labour market questionnaires since 1994. Firstly, there was a changeover from the annual October Household Survey (OHS) to the bi-annual Labour Force Survey (LFS) in 2000 and, since 2008, a transformation from the LFS to the Quarterly Labour Force Survey (QLFS). As a result, a long series of data has been created that this study seeks to use in order to analyze trends in the female labour market.

Despite the aforementioned improvements, numerous recent South African studies (e.g., Casale and Posel 2001, 2002; Goga et al. 2007, etc.) have only derived "trends" in the South African labour market by comparing the 1995 OHS with the latest available LFS, without taking into consideration the comparability of the datasets. The transformation from the OHS to the LFS came with changes in sampling design, sampling size and questionnaire design.

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[1] The Labour Relations Act (1996) was aimed at promoting collective bargaining at sectoral level and employee participation in the workplace, as well as promoting dispute resolution and labour peace (Barker 2008: 80).

[2] The Basic Conditions of Employment Act (1998) was introduced to regulate the right to fair labour practices by establishing and enforcing basic conditions of employment. Provision is made for work hours, overtime and overtime pay, contracts of employment and the termination thereof, sick leave, etc. (Barker 2008: 77-80).

[3] The Employment Equity Act (1999) was implemented to ensure fair treatment and achieve equity in employment through promoting equal opportunities and implementing affirmative action measures to redress the disadvantages of the past experienced by people from the designated groups, i.e., women and African people (Barker 2008: 245-246).

[4] Affirmative Action was introduced in South Africa with the aim of achieving a diversified workforce broadly representative of the population in all occupational categories and levels through the appointment of suitably qualified people from the designated groups (Barker 2008: 247-248).

[5] The Skills Development Levies Act (1998) was introduced to develop the skills of the workforce and thereby to increase the quality of working life of workers, improve the productivity of the workplace, and promote self-employment and the delivery of social services. Every employer with an annual payroll exceeding R250 000 must pay a skills levy of 1% of total payroll to the South African Revenue Services. The funds collected go to the National Skills Fund (NSF) and the Sector Education and Training Authority (SETA) to provide training and education opportunities to the labour force.

Other changes include the derivation of both the labour market status and the formal/informal sector status, as well as the derivation of new variables (unemployment status and underemployment status). In addition, the QLFS labour market status methodology raises incomparability issues between the OHS/LFS and QLFS. A recent study by Yu (2008) looked mainly at general labour market trends since 1995 by using all survey datasets, with only a small focus on what happened to the female population.

## 1.2    Research questions

This study aims to use all the South African labour survey data from 1995 to 2009 to investigate gender trends, with particular focus on females, in the labour market since the transition by answering the following questions:

- Has there been a relatively rapid increase in the size of the female labour force since the transition, compared with that of the male labour force size?
- Has there been any improvement in the probability of female employment since the transition?
- What are the working conditions and remuneration of the female employed compared with those of the male employed?
- What are the characteristics of the unemployed by gender?
- Is there any evidence of a gender gap with respect to employment probability and remuneration? Does the gap exist mainly due to the fact that women are weaker in ability (e.g., education, experience, etc.), or is it rather due to discrimination in the labour market?

## 1.3    Structure of the study

Chapter 2 will review recent literature on labour market trends, with special focus on the findings relating to the activities of the female population. Chapter 3 will provide an overview of the characteristics of the South African labour force (LF), labour force participation rates (LFPRs), as well as information on  the employed and unemployed respectively, with the analyses conducted by gender. Bivariate statistical analyses will mainly be conducted in this chapter. Chapter 4 contains a multivariate analysis of the determinants of the likelihood of participation in the labour force, the likelihood of employment and earnings from the main job, drawing on the variables used in the descriptive analyses in Chapters 3. Chapter 5 will use Oaxaca-Blinder (1973) decomposition to investigate whether affirmative action policies

have successfully reduced the employment gap and wage gap between the genders. Chapter 6 will conclude the study.

For the remainder of this study, the OHSs will be referred to as OHS1993, OHS1994, etc., while the LFSs will be referred to as LFS2000a (for the first round of LFS in 2000), LFS2000b (second round in 2000), LFS2001a, and so forth. The QLFSs will be referred to as QLFS2008Q1 (for the first round of QLFS in 2008), QLFS2008Q2 (second round in 2008), and so forth.

# CHAPTER 2: LITERATURE REVIEW

## 2.1   Introduction

In this chapter, recent studies of trends in the South African labour market since the political transition will be reviewed, with a particular focus on the findings, if any, relating to the female population. In general, the studies could be categorized as follows: (1) studies that compared OHS1995 with the latest available OHS/LFS/QLFS to derive the labour market "trends" since the transition, focusing on the LF, LFPRs, employed, working conditions of the employed, unemployed and unemployment rate; (2) studies that used all the available OHSs/LFSs/QLFSs to derive the real labour market trends over the period, focusing on the same variables as those in (1); and (3) studies that also used all the available OHSs/LFSs/QLFSs, but analysed trends in other variables, such as earnings, the wage gap, as well as the extent of employment and wage discrimination, with the use of techniques such as Oaxaca-Blinder (1973) decomposition. This chapter will focus on reviewing the results of these studies.

## 2.2   Literature review
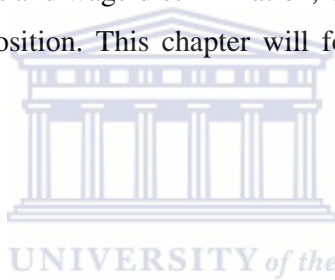
### 2.2.1 Studies that compared two labour surveys to derive labour market "trends"

These studies could be categorised as follows: Group (A): Studies focusing only on general labour market trends, with a minor focus on what happened to the female population, e.g., Poswell (2002), Bhorat (2004, 2005, 2006, 2009), Bhorat and Oosthuizen (2005), Burger and Woolard (2005), and Oosthuizen (2006); Group B: Studies that followed a similar method of analysis, but focused specifically on the possible factors contributing to the youth unemployment and graduate unemployment problems respectively, e.g., Mlatsheni and Rospabe (2002), and Pauw, Oosthuizen and Van der Westhuizen (2006); Group C: Studies with the primary objective of analyzing what happened to the female population, as well as investigating whether there were significant differences between men and women with regard to how they had fared in the labour market since the transition, e.g., Casale and Posel (2002), Casale (2004), Goga et al. (2007) and Ntuli (2007).

**Group A**

Poswell (2002) compared the OHS1995 with the OHS1999, focusing mainly on the characteristics of the employed. She found that even though both labour demand (i.e., employment) and labour supply (i.e., the LF) increased between 1995 and 1999, the growth in labour supply outweighed that in labour demand. This resulted in an increase in unemployment. Between the two surveys, the country also witnessed an increase in the availability of jobs. However, there was a gross mismatch between the skills held by the population and those that were required. As a result of this skills mismatch, the created jobs were not enough to meet the requirements of the new entrants into the LF. The financial and business services, followed by the trade sector, recorded the largest increase in employment. Regarding employment by occupation, professionals and managers showed the largest increase in employment. This implies that there was a greater demand for highly-skilled workers in the labour market. Poswell (2002) also noted that one of the key challenges facing the economy was to match the increase in demand for highly-skilled workers with an adequate supply. The situation was exacerbated by the emigration of many highly-skilled professionals, which was projected to worsen further with the increasing impact of HIV/AIDS. It thus was imperative to establish which skills were required and to train people accordingly.
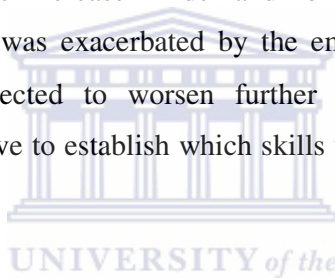
With respect to employment by race, gender and education, Poswell (2002) found that all race groups experienced increases in employment, with the highest increase being reflected in the Coloured population, followed by Indians, Africans and, lastly, Whites. With regard to gender, the rate of increase in participation in the labour market by women between the two surveys was 30% more than that of their male counterparts. This increase was twice that of male participation between the two surveys. This difference was attributed to the following reasons: there was a decline in the percentage of married women, which might in turn have prompted women to enter the labour market aggressively; there was an increase in educational attainment by women; the traditional roles of women may have declined, as the society may have changed its view of the role of women; and women possibly felt more optimistic about entering the labour market to pursue employment opportunities after the implementation of affirmative action and other labour legislations. Finally, women dominated most of the newly created jobs. Poswell (2002) concluded that women fared better than their male counterparts between 1995 and 1999, as indicated by their greater representation in the labour market and in employment.

Studies by Bhorat in 2004 and 2006 provided snapshots of the labour market at two points in time, mainly focusing on the narrow definition[6] of labour market status and comparing the OHS1995 and the LFS2002b in an effort to identify important developments in the labour market. First, Bhorat (2004) noted that the economy's movement towards output shifts in the tertiary sector from primary sector, combined with improvements in technology and rising capital-labour ratios, have resulted in an increase in the demand for highly-skilled workers. This affirms with findings of Poswell (2002).

In addition, Bhorat (2004) found that the growth in the number of jobs was far outstripped by the expanding LF. Furthermore, the growth in the economy was accompanied by growth in employment. This implies that jobless growth under the first definition (i.e. real Gross Domestic Product (GDP) expansion complemented by a decline in absolute employment level (Altman 2003: 12)) did not happen in the South African economy. Whether jobless growth under the second definition (i.e. real GDP expansion complemented by an increase in unemployment rate (Altman 2003:12)) took place or not was not investigated by Bhorat (2004). In addition, the economy was characterised by low GDP growth rates, which in turn rendered it unable to provide adequate employment. A more detailed look at the employment trends indicates that, even though all racial groups experienced increases in employment between the two surveys, employment was mostly dominated by Indians, followed by Africans, Coloureds and Whites. Furthermore, the labour market exhibited preferences for highly skilled and semi-skilled workers over unskilled workers. This was evident from the high concentration of employment towards the tertiary sectors, especially in financial, insurance and business services, where employment doubled over the seven-year period.

As far as unemployment rates are concerned, the study found that Africans had the highest unemployment rates, while Whites recorded the lowest. African unemployment rate increased to 47% in LFS2002b, from 36% in 1995. During the same period, the White unemployment rate increased by 4.4 percentage points to reach 9% by LFS2002b. The unemployed were mostly concentrated in households with no wage or salary earnings, and/or that were very dependent on old-age pensions and other grants by the State. Youth unemployment also became more serious; in fact, Bhorat (2004) noticed the beginning of the graduate unemployment problem in South Africa, as the unemployment rate of people with post-Matric qualifications increased between the two surveys.

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[6] The narrow and broad definitions of labour market status will be discussed in Chapter 3.

In line with Poswell (2002), Bhorat (2004) found that, between the two surveys, women experienced greater increases in employment than men. The growth in the employment of women was five times more than that of their male counterparts (30% versus 6%). Unfortunately, women also dominated the unemployment figures. In 2005, Pirouz noted that "households are important sources of labour market information because it provides incentives or disincentives to participate in the labour market". Therefore, against this background, Bhorat (2006) analysed the LFS2002a data further by running ordinary least squares (OLS) regression on the narrow unemployment rate for households and the results showed that unemployment was higher in households with low expenditure, staying in rural dwellings, receiving social grants (old-age pensions and/or child support grants), as well as those households that had fewer trade union members. With respect to gender, Bhorat (2006) found that women were still more likely to be unemployed. Finally, it seems Bhorat (2004, 2006) paints a two-sided picture of the situation of women since the transition, as shown by the greater increase in both employment and unemployment.

Bhorat (2005), focusing on the narrow definition once again, compared the OHS1995 with the LFS2003b and found that, in terms of skills and job permanence, women, Africans and unskilled individuals were worse off in the South African labour market. There was a significant growth in employment between the two surveys. However, the nature of this growth was biased towards highly-skilled and semi-skilled workers. In addition, the number of casual workers had increased. These casual workers were dominated by women, Africans, individuals residing in rural areas[7] with low levels of education, and those involved in unskilled occupations and in industries with a low unionisation rate.

In his 2009 study, Bhorat compared OHS1995 with LFS2005b and estimated a Heckman two-step employment probability[8] model. It was found in both surveys that Africans aged from 15 to 24 years, who had no Matric and who resided in provinces other than Gauteng and the Western Cape, were more likely to be unemployed. Since the advent of democracy, women were more likely to be unemployed: they were 3.7% more likely to be employed in 1995 and 11.43% less likely to be employed in 2005b, compared to men. Bhorat (2009) concluded that the situation of women in the labour market had deteriorated since the transition, contradicting the findings of his previous studies to a certain extent.

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[7] Since LFS2004b, the area type variable is no longer available.
[8] This two-step approach dealing with sample selection bias will be discussed in Chapter 4.

Next, Burger and Woolard (2005) derived the labour market trends by comparing OHS1995 with the LFS2002a. Using the broad definition, they focused on unemployment rates as well as the characteristics of the employed. Regarding the LF, there was rapid growth in the shares of Africans, and of individuals below the age of 35 years. Furthermore, the LF became more educated on average. Employment increased between the two surveys, but the pace of this increase was relatively slower compared with that of the LF. The share of employed involved in highly-skilled or semi-skilled occupations increased by two percentage points in each category, confirming the findings by Poswell (2002) and Bhorat (2004) that there is a greater demand for highly-skilled workers. In addition, the employed were more likely to be African, male and above 25 years old, staying in the Western Cape or the Gauteng provinces, and with at least a Matric.

With regard to unemployment, the study reported, in line with Poswell (2002), a rising trend caused by the fact that job creation did not match the growing labour supply. Further analyses showed that Africans and Coloureds dominated this trend. Unemployment was high amongst rural workers as well as the youth. Women were more likely to be unemployed. Burger and Woolard (2005) also noted an increase in women's shares of both the LF and the employed. However, although female employment showed a greater increase between the two surveys, the female share of employment was still below 50%. The study also coincides with Bhorat's (2004) findings that women recorded higher unemployment rates. Burger and Woolard (2005) concluded that even though their unemployment rates were still high, women had fared much better since the transition, as indicated by their greater likelihood of participation and employment compared with males.

Bhorat and Oosthuizen (2005), as well as Oosthuizen (2006), derived labour market 'trends' by comparing OHS1995 with the latest available LFS (LFS2002b in the former study, and LFS2004b in the latter study). Focusing on the broad definition, both studies had similar findings. Bhorat and Oosthuizen (2005) investigated the characteristics of the LF, employed and unemployed. The increase in the LF was dominated by Africans (representing 85% of the increase), particularly female job seekers. Both studies found that most of the new entrants to the LF resided in urban areas. The LF was more educated on average in the LFS.

Looking at employment, it was mostly dominated by Africans, those aged from 35 to 54 years, and staying in the Eastern Cape and KwaZulu-Natal, as well as individuals with post-Matric qualifications. Between their respective periods under investigation, both studies found

that the target growth rates[9] (TGR) were always greater than actual growth rates[10] (AGR) in all races and gender groups, resulting in employment absorption rates[11] (EAR) below 100%. (At 35%, women's EAR was more than twice that of their male counterparts, providing evidence of the feminisation of the South African LF). Therefore, Bhorat and Oosthuizen (2005), as well as Oosthuizen (2006), reached similar conclusions as Poswell (2002) and Bhorat (2004), namely that the growth in the number of jobs was far outstripped by the expanding labour force. Broadly speaking, the studies noted a relative increase in the LFPR of Africans, rural dwellers as well as younger age cohorts. The Limpopo province recorded the lowest LFPR.

Regarding unemployment, it was skewed towards individuals without tertiary education. Africans had the highest unemployment rates compared to other race groups. Unemployed individuals were also increasingly marginalised in households with no wage or salary earnings, raising the demands placed on elderly household members' old-age pension and other grants from the State (complementing the findings of Bhorat (2006) discussed previously). Furthermore, Oosthuizen (2006) ran a simple probit regression on labour force participation and a two-step Heckprobit regression on employment likelihood. The former regression found that Africans, men, individuals who had more than 12 years of education, and individuals from all provinces other than the Eastern Cape and Limpopo were more likely to participate in the labour market, while the latter regression indicated that youngsters, Africans, women, and individuals from Limpopo and without Matric were less likely to find employment.

The studies had similar findings relating to the female population, noting that the female shares of the broad LF by race, education and location were rising and marked a continuation of the feminisation trend in the LF. Finally, with regard to employment, the studies reached different conclusions. Bhorat and Oosthuizen (2005) agreed with Poswell (2002), as well as with Burger and Woolard (2005), that women were faring much better since the transition compared to their male counterparts, as indicated by their greater likelihood of participation

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[9] The target growth rate (TGR) measures how fast employment would have to expand in order to provide work for all the new entrants into the market from period X to period Y. Period X and Y need not be two consecutive years. TGR = $(LF_Y - LF_X)/E_X$, where LF and E stand for the numbers of the labour force and employed respectively (Bhorat and Oosthuizen 2005:9).

[10] The actual growth rate (AGR) is the growth rate of the number of employed from period X and Y. AGR = $(E_Y - E_X)/E_X$.

[11] The employment absorption rate (EAR) measures the proportion of the increase in the labour force from period X to period Y that finds employment during the same period (Bhorat and Oosthuizen 2005:9). The EAR is equal to the AGR divided by the TGR. If the EAR is 100%, it shows that the labour market has absorbed all the entrants into the labour force (Bhorat and Oosthuizen 2005:10).

and employment, while Oosthuizen (2006) argued that women were less likely to find employment.

**Group B**

With regard to these studies, it has been noted that the South African economy experienced rising unemployment among youths and graduates (Bhorat 2004). Against this background, Mlatsheni and Rospabe (2002), as well as Pauw et al. (2006), have contributed to the literature on youth unemployment. Firstly, while investigating the possible variables that contributed to the probability of youth being employed, Mlatsheni and Rospabe (2002) utilised OHS1999, which focused specifically on youth aged between 15 and 30 years. They reported that 20% of the economically active population (EAP) were youth between the ages of 15 to 24 years, while increasing the age range to 30 years led to an increase of 20 percentage points. This was attributed to the fact that most of these youth were still at school. Noting that youth unemployment was greatly influenced by aggregate demand, unrealistic youth wages, the size of the youth LF and the inadequacy of skills among the youth, they found that unemployment was unequally distributed between race and gender. Specifically, young Africans were affected by unemployment more than the other races, i.e., Whites, Indians and Coloureds. Only a handful of young workers were self-employed, and women were discriminated against, both in terms of wages and self-employment. In total, the unemployed youth represented a greater share of the unemployed in the economy, as 58% of the jobless were 15 to 30 years old. In addition, the study noted that the major percentage differences in wage employment of African youths  and their Whites counterparts was unexplained by observable characteristics and most likely reflected some hiring discrimination by employers.

Mlatsheni and Rospabe (2002) also investigated the determinants of access to employment and found that education played a major role in the probability of finding a job. Compared to women, young men were more likely to be employed. In fact, out of every 10 employment opportunities that had been created, it was estimated that men would occupy six. This, however, provides evidence of gender discrimination in the labour market. Young white individuals were more likely to be employed. In addition, youth aged 15 to 24 years were less likely to be employed than those in the 24 to 30 year age group. Having previous work experience increased employment probability. The youth in urban areas were less likely to find employment due to rural-urban migration, which led to decreased employment opportunities amongst the youth, while those in Western Cape were more likely to be

employed. The analyses of women found strong evidence of discrimination against women in both wage employment and self-employment. Young women were also most likely to be affected by unemployment. Mlatsheni and Rospabe (2002) did not think that the situation of female youths had improved since the transition, as shown by the lower likelihood of participation and employment compared to male youths.

Lastly, Pauw et al. (2006) broadly discussed graduate unemployment by comparing OHS1995 with LFS2005b. Their study found that, even though the LF appeared to be more educated on average, the employed were fairly older and unemployment was skewed towards those who possessed secondary and tertiary education. The study reported an increase in African graduate unemployment (this is consistent with the findings of Mlatsheni and Rospabe (2002)) and this has been linked, among others, to their choice of study institution and the quality of education they received. Students who attended historically white schools, irrespective of race, adjusted to the formal working environment more easily, as they had social skills as well as work experience attained through participating in various activities like social bodies and administrative and/or academic assistants in their departments. However, those with no education had lower LFPRs due to their reduced chances of finding employment. Finally, Pauw et al. (2006) associated the increase in South African graduate unemployment with the lack of investment in further training by firms, as well as firms' preference for employing experienced workers. Coupled with this, graduates were reported to have high wage expectations, but lacked the necessary experience to justify these expectations. Pauw et al. (2006) did not analyse the graduate unemployment problem by gender.

**Group C**
In an effort to describe changes in female labour supply and employment, Casale and Posel (2002) focused on the narrow definition and compared the OHS1995 with the OHS1999. In general, the study noted that the economy was not creating enough jobs to absorb all the new entrants into the labour market. However, a noticeable increase in employment occurred between 1995 and 1999. Both genders recorded increases in the LF, but the increase was more rapid among women. In terms of LFPRs, the rate of increase in female LFPRs was greater than that of their male counterparts between the surveys. This implies that the LF was feminized between 1995 and 1999. The study associated this increase with a number of factors, among others the reduction in remittance transfers to women as a result of the reduction in access to male income, as well as the increase in female-headed households. Women also recorded a higher increase in employment than their male counterparts, but the

bulk of this employment was in unskilled and low-paying elementary work. In addition, more women were discouraged and greatly affected by unemployment. The authors concluded that the feminisation of the South African labour market was skewed towards higher unemployment and low-paying, insecure jobs (if employed).

Casale (2004) studied the relationship between female employment and the earnings of women by comparing the OHS1995 with the LFS2001b. She found that even though the increase in employment was dominated by African females, they earned less, on average, than their white counterparts. African women were also over-represented in unskilled occupations and jobs that were characterised by low security and earnings, e.g., informal self-employment and domestic workers. Nonetheless, they still reached the general conclusion that the South African labour market was more feminized.

Goga et al. (2006) focused on the narrow definition and analysed the changes, if any, in the situation of women in the South African labour market between OHS1995 and LFS2005b. In general, the results are in line with other, earlier studies (i.e., Casale and Posel 2002; Poswell 2002; Bhorat 2004; Bhorat and Oosthuizen 2005; Oosthuizen 2006) that the increase in participation in the LF in the South African economy was not matched by an equally rapid pace of increase in job creation over the period under investigation. In additional, because most of the participants in the labour market had at least Matric, the study shared the views of Burger and Woolard (2005) and Oosthuizen (2006) that, on average, the LF was more educated. The largest percentage increases in participation in the labour force occurred in the two oldest age groups (45 to 54 years and 55 to 65 years). It was found that an individual's level of education was an important predictor of her likelihood of finding employment.

The increase in participation in the labour force was driven primarily by women. In fact, women accounted for almost six out of 10 new LF members over the period, with African women accounting for almost five of the six. This speedy growth was linked to the improvements in geographical and work-related movement that occurred during the late 1980s, as well as to the newly introduced labour legislation in the 1990s. In addition, although most women (especially African women) benefited more from employment and accounted for more than half of the increase in employment compared to their male counterparts, the female unemployment rate remained higher. However, in line with Casale and Posel (2002), the study found that women continued to dominate in unskilled and low-paying elementary

occupations, as well as in informal activities. Between 1995 and 2005, both genders witnessed increases in unemployment, but most of the increase was dominated by women.

Finally, Ntuli (2007) investigated the determinants of participation in the labour force by South African women between OHS1995 and LFS2004b, focusing on the broad definition. Noting the magnitude of women's contribution to economic activities, as indicated by participation in the labour force, she estimated a logit model of participation in the labour force. The results indicated that higher levels of education resulted in a higher likelihood of participation in the labour force. Women in rural areas were less likely to participate in the labour market. This was aggravated by society's ancient mindset that limited women's movements to urban areas and further limited their chances of participating in economic activities. Marriage also has a negative effect on women's ability to participate in the labour market. The non-labour income outcomes revealed that, on average, it contributed more to the low participation rates of South African women than marriage and fertility. Looking at labour force participation according to area, women who lived in the Western Cape were more likely to participate in the labour market. The study also concluded that female employment was characterised by undesirable characteristics such as low security, as well as low-paying elementary occupations.

To conclude, most of the studies in group C agreed that women had fared better since the transition, as shown by their greater likelihood of participation and employment compared to their male counterparts. However, employed women were over-represented in low-paying, unskilled occupations.

To summarize this section, the studies discussed above provide a snapshot of the labour market by comparing the OHS1995 with the latest available OHS/LFS to derive labour market 'trends'. Generally, there was an increase in the LF, and this increase was attributed to increases in the African LF, individuals who fall below 35 years in age, as well as individuals who have a secondary education. Most of the employed were Africans. All race groups noticed rising unemployment rates, but Africans recorded higher growth rates than the other races. Specifically, women accounted for more increases in the LF, as well as occupied more employment opportunities. Evidence of the feminisation of the LF was also presented, but it was complemented by higher female unemployment rates and a high proportion of women employed in less secure, low-paying elementary jobs. Graduate unemployment has become a noticeable problem in recent years. The TGRs were always greater than the AGRs in all races

and gender groups, resulting in employment absorption rates (EAR[12]) below 100 percent. Lastly, the growth in the South African economy was accompanied by employment creation therefore refuting any allegation of jobless growth under the first definition.

2.2.2 Studies that used all the available datasets to derive labour market trends

As a result of the incomparable aspects of the OHS1995 and the LFSs, conclusions reached by comparing two surveys (e.g., OHS1995 and the latest available LFS) could be unreliable. Yu (2008) argued that this could be attributed to the nature of changes in the sampling frames and the method used to capture employment status, the lack of consistency in the design of the questionnaires, and errors observed during coding. In addition, comparing OHS1995 with an LFS only gives snapshots of the South African labour market at two points in time. Unfortunately, most of the South African studies adopted this approach, as discussed in 2.2.1. Also, the OHS1995 metadata document is not available, so the method used to derive the labour market status, the sampling techniques, etc. are not known[13]. In this regard, studies such as those by Altman (2003, 2008), Casale, Muller and Posel (2004), Yu (2008) and Hlekiso and Mahlo (2009) used all the available OHS/LFS data at the time of writing to derive long-term South African labour market trends. Specifically, Altman (2003, 2008) and Casale et al. (2004) focused on employment trends. Hlekiso and Mahlo (2009) analysed the interrelationship of the occupational skills/unskilled workers, their education levels as well as wages and the demand and supply characteristics of the South African labour market. Lastly, Yu (2008) studied labour market trends since 1995.

The 2003 study by Altman focused on the broad definition and used OHS1995 to 1999, as well as the LFS2000 and LFS2001 September data. Investigating whether South African employment trends supported a basic definition of jobless or job-creating growth, the study found that most of the increases in employment during the period under study occurred in the informal sector. However, much of the increase was attributed to improvements in the questionnaire design by Stats SA. Altman (2003) also suspected the presence of discrimination in the South African labour market, which was evident from the fact that Whites continue to occupy more higher-paying jobs than other race groups. She briefly looked at unemployment and found that it was exacerbated by the growing LF as a result of population growth, along with reduced employment opportunities. Unemployment was

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[12] The female EAR was always lower than the male EAR.

[13] Stats SA was contacted with regard to the OHS1995 metadata, but no response was received.

skewed towards Africans, especially those living in rural areas, and youngsters. In fact, close to 72% of individuals under the age of 35 years were unemployed.

The female unemployment rate was always higher, especially that of African women in rural areas. On average, employed women earned much less than their male counterparts. Looking at work activities, women (particularly Africans) were over-represented in low-paying occupations such as domestic and elementary work. Finally, Altman (2003) did not think that women had fared any better since the advent of democracy, as indicated by their greater likelihood of unemployment, low earnings and over-representation in unskilled occupations.

In her 2008 study, Altman examined employment trends by using the 1995 to 1999 OHSs and all the 2000 to 2006 September LFSs. By focusing more on job losses and gains, she reviewed three economic sectors (agriculture, mining and community, and social and personal services), but also took into consideration the improved and alignment of coding within the OHSs. Close to 1.4 million jobs were lost between OHS1995 and OHS1997. A further increase of 0.5 million job losses was recorded between 1997 and 2006. Of these job losses, about half a million occurred in the formal sector and expanded to 1.5 million between 1997 and 2006. The informal sector (except for subsistence agriculture) created 2.5 million employment opportunities between 1995 and 2006. However, the study placed much emphasis on the reliability of these figures because of inconsistencies in the methodologies adopted by Stats SA, coding errors as well as overestimation of employment figures in the OHS1995. The study did not analyse employment trends by gender.

Next, Casale et al. (2004) selected a few OHSs (1995, 1997 and 1999) and LFSs (2000b, 2001b, 2002b and 2003a) to investigate labour market trends in South Africa between 1995 and 2003. Their primary focus was to assess the validity of the claim by the South African government that the economy had employed two million people over the period under investigation. Based on the fact that the economy was characterised by skyrocketing unemployment rates coupled with large-scale retrenchments during this period, the study questioned the legitimacy of the claim that two million jobs had been created. In addition, it was noted that employment trends were very sensitive to reference points of analysis[14]. The study also took into consideration the definitional changes relating to the growth in employment and found that instead of the reported two million, the economy actually had created only about 1.4 million jobs. Specifically, more Africans were employed than their

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[14] The abrupt changes in employment since the transition will be discussed in Chapter 3.

white counterparts, but most of this African employment was skewed towards unskilled employment, such as subsistence farming and informal sector self-employment. The earnings gap between Africans and Whites showed that, on average, Whites earned almost 250% more than Africans. The study noted that the number of unemployed rose dramatically and that the ranks of the unemployed continued to be dominated by Africans. The study did not analyse female activities in the labour market.

Yu (2008) focused on the broad definition when analysing all the data from OHS1995 to LFS2006b, and looked at the characteristics of the LF, employed and unemployed, work activities and working conditions of the employed, as well as trends in the LFPRs and unemployment rates. He found that, during the OHSs, both the narrow and the broad LF and the LFPRs showed increases. Most of these increases were caused by males. The growth in the female LF was insignificant between OHS1995 and OHS1996. An abrupt increase took place when the OHS was transformed into the LFS, but the female broad LF and LFPR were reported to have stabilised in the LFSs. The abrupt break in the trends between the OHS1999 and the LFS2000a could be due to the improved capturing of participation, rather than a real increase.

The male LF and employment numbers were both seriously overestimated in OHS1995 (when compared with the corresponding figures in OHS1996). Hence, comparing OHS1995 with an LFS could result in a misleading conclusion that the increases in both the male LFPR and male employment between the two surveys were slower. With respect to unemployment, both the narrow and broad unemployment rates increased continuously from OHS1995 to LFS2003a, before being replaced by a continuous downward trend since LFS2003b. Further investigation showed that employment increased continuously during the period under study (except for the rapid declines in OHS1996 and LFS2001b and the small decline in LFS2004a), indicating that jobless growth did not happen under the first definition. However, there was jobless growth under the second definition until LFS2003a, since the unemployment rate increased continuously in terms of both the narrow and broad terms between 1995 and LFS2003a.

The growth in the female LF was found to be insignificant, while that the female LFPR was still lower than that of the males. Female employment was inconsistent during the OHS years while males dominated employment figures in the LFS years. Lastly, unemployment was skewed towards women of all race groups. Against this background, and in terms of the LFPR

and employment, Yu (2008) concluded that the labour market did not witness any feminisation of the LF. This conclusion was in contrast with the conclusions that were drawn by other researchers (i.e., Casale and Posel 2002; Casale 2004; Ntuli 2007). According to Yu (2008), although the situation of women had improved since the transition, men still fared better, as indicated by their greater likelihood of employment.

Finally, Hlekiso and Mahlo (2009) used all of all the September LFSs from 2001 to 2007 to derive employment and unemployment trends in the South African labour market. Specifically, they focused on the skills levels of the employed, their educational attainment, and their earnings. The study noted that the narrow unemployment rate exhibited an increasing trend. In addition, Africans, especially those in the 15 to 34 year age group, recorded higher unemployment rates. Unemployment was more prevalent amongst individuals who worked in unskilled and elementary occupations, as well as amongst those without Matric.

Increases in employment mostly occurred in highly-skilled occupations. However, these highly-skilled occupations were mostly dominated by Whites and least dominated by Africans. With respect to wages, the labour market showed signs of racial segregation. Africans earned less than all other race groups on average. Hlekiso and Mahlo (2009) also found that the mean wage of employed men was higher. Individuals with post-Matric qualifications, especially those who had a tertiary education, earned more on average. Furthermore, women were more likely to be unemployed and, if employed, were more likely to be involved in low-paying occupations. Thus, Hlekiso and Mahlo (2009) agreed with Yu (2008) that, since the transition, the situation of women had improved, but that men still fared better.

2.2.3 Studies that used all datasets to analyse trends in other variables

This section discusses studies that used most, if not all, of the datasets available at the time of writing to derive labour market trends in the South African labour market. Instead of analysing characteristic of the LF, LFPR, employment and unemployment rates, these studies primarily attempted to analyse wages trends, wage gaps and labour market discrimination in South Africa. Firstly, Rospabe (2002) estimated the level of racial discrimination in the South African labour market by reviewing the OHS data between 1993 and 1999. The study identified the important elements of labour market outcomes as being the probability of employment, occupational attainment as well as earnings. In this regard, it was found that

there was a reduction in the racial discrimination in labour participation, while increases were witnessed in occupational and wage discrimination on the basis of race.

The differences in human capital investment led to disparities in unemployment across all racial groups. The disparities were the root causes for Whites having greater employment opportunities than Africans. In addition, the study also identified that the discriminatory behaviour of the employer (whether intended or unintended) had an effect on the level of labour market discrimination. The study ran a probit model on participation and estimated the probability of Africans and Whites being employed in a higher paying job between 1993 and 1999. It was noted that higher levels of educational attainment were positively correlated with a person's chances of landing a higher-paying job. The results showed that Whites occupied most of the highly-skilled occupations, as they represented 54% of the skilled occupations, while the share of Africans was only 12%. Also, for the white racial group, choice of employment was influenced by family background. Furthermore, the results showed that married household heads were more likely to be employed. The study noted that differences in earnings between Africans and Whites reduced between 1993 and 1999.

Secondly, Brookes and Hinks (2004) used two OHSs (1995 and 1999) and three LFSs (2000b, 2001b and 2002b) to broadly examine the employment gap by race between 1995 and 2002. Overall, the study found that Whites, followed by Indians and Coloureds, were more likely to be employed. The study also reported that, in 1995, the observed employment probability gap between Whites and Africans was 32.4%. However, the gap increased to 39.3% by the end of 2002. Similar findings were recorded on the White probability gap with other races. During the period under investigation, employer favouritism of Whites increased and employers' discrimination against Africans was recorded.

Brookes and Hinks (2004) ran an employment probit and found that a higher educational attainment was associated with a greater probability of obtaining wage employment. In addition, individuals with many household dependents (i.e. the number of children or elderly) were less likely to be employed as a result of their reduced labour market participation[15]. Employment likelihood was lower in the Eastern Cape and Limpopo. Married people had a higher probability of finding employment. Furthermore, women were less likely to be

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[15] This is consistent with the job search theory of Polachek and Siebert (1993).

employed. This finding was linked to the societal mindset[16] in relation to the traditional role of women in the household. Against this background, Brookes and Hinks (2004) did not believe that the situation of the female population had improved since the advent of democracy.

Thirdly, Burger and Jafta (2006)[17] used OHS1995 to 1999 and LFS2000 to 2004, and implemented the decomposition techniques of Oaxaca and Blinder (1973)[18], Brown, Moon and Zoloth (1980) and Juhn, Murphy and Pierce (1991, 1993). They analysed three stages of the employment process, namely the employment, occupational attainment and wage determination, by race. The study mostly reached similar findings to those of Brookes and Hinks (2004), and found that the labour market displayed qualities of inequality and the dominance of racial discrimination. Despite being the minority in the labour market, Whites continued to earn more than all the other race groups. In fact, they earned twice as much as the group (i.e. Indians) that earned the second most. During the survey transformations, African wages seemed to show increases, but this phenomenon was attributed to changes in the methodology used by Stats SA, rather than to labour market policies.

Higher educational attainment was once again linked to increased chances of finding employment in the high-paying jobs. Being married increased the chances of being employed, while additional children reduced the chances of finding employment. Whites were more likely to be employed than other race groups. This is evident from their low unemployment rate of 6%, compared to unemployment rates of 14%, 23% and 38% for Indians, Coloureds and Africans respectively. In addition, the labour market showed preferences for highly-skilled workers relative to unskilled ones. These highly-skilled jobs were mostly dominated by Whites when compared to the other race group. With respect to discrimination, the study reported an increasing trend in the unexplained component of the employment gap as well as the wage gap for Africans, Coloureds and Indians, when compared with Whites. In this regard, Burger and Jafta (2006) concluded that Affirmative Action policies implemented after the transition were not successful in reducing discrimination in the labour market. The study did not report anything on labour market discrimination by gender.

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[16] This mindset views the role of women as being child bearing and rearing, water collection, cleaning and cooking (Brookes and Hinks 2004:585).

[17] This study excluded the informal sector and domestic workers from its analyses. Wages and employment figures from these sectors are believed to be volatile, as these sectors are less responsive to affirmative action.

[18] The Oaxaca-Blinder (1973) decomposition technique will be discussed in detail in Chapter 5.

Fourth, Burger and Yu (2007) used the all the available OHSs and LFSs at the time of writing to derive average real monthly wage trends in the South African labour market by dealing with outliers. Generally, they identified that the labour market still displayed strong traits of racial wage gaps. In addition, the study reported that the racial earnings gap had tightened since 2003, whereas the gender earnings gap had shown signs of shrinkage since 2000. However, after considering the inconsistencies in questionnaire design and excluding outliers (i.e. those reporting zero or excessively high earnings, as well as self-employed and informal workers), the study constructed real wage trends for formal employees and witnessed a slight upward trend since the advent of democracy.

In line with Burger and Jafta (2007), Burger and Yu (2007) found that employed Whites earned twice more than the group (i.e. Indians) earning the second most, while Coloureds and Africans earned less than all the other races respectively. On average, men earned more than women. Higher education level (i.e. tertiary education) was associated with higher earnings. Burger and Yu (2007) also found that, irrespective of their educational background, Africans recorded higher unemployment rates than any other race group. On average, the female population continued to earn less than their male counterparts. Burger and Yu (2007) concluded that women had not fared any better since the advent of democracy.

A recent study by Armstrong and Steenkamp (2008) used all the OHSs (1995 to 1999) and the 2000 to 2004 LFSs to study the union wage premium in South Africa between 1995 and 2005. The study only included formal sector employees earning less than R200 000 per month (2000 prices) for the analyses. Specifically, the paper focused on African males in an effort to separate the union effect and to comprehend any discrimination that might have occurred. With respect to union density, the study found that Africans were overly represented in unions that other race groups. Union membership was associated with higher earnings, as well as having the ability to positively influence wage equality in the labour market. The public sector was reported to have more union members than the private sector. In this regard, unions were seen to be more influential towards public sector wages than to private sector ones. Other findings revealed that unionised workers had higher educational attainment than non-unionised workers, therefore the unionised sector paid more than the non-unionised sectors. Female employed union members earned more than male employed union members, while the opposite happened when looking at employed women who were not union members. Looking at the wage gap by union membership, even though the mean wage remained stable between 1995 and 2005, there was a decline in 1997, after which increases were recorded until 2002.

Lastly, the Oaxaca-Blinder (1973) decompositions showed that, on average, the unexplained component of the mean wage gap by union membership displayed an increasing trend for the entire period under investigation. This result implies that union membership worsened the discrimination problem in the labour market.

Shepherd (2008) used the OHSs between 1996 and 1999, as well as the September LFSs between 2000 and 2006, to investigate the degree and progression of gender wage discrimination in the South African labour market after the advent of democracy. The study focused only on African formal sector employees. Furthermore, the study used Oaxaca-Blinder (1973) decomposition techniques to conduct its investigation. African women were more likely to be affected by wage discrimination. Generally, the results showed that traces of gender wage discrimination for women of all races declined from 1997 and steadied from 2000. Specifically, discrimination mostly affected African women. In addition, high levels of education were linked to an increased probability of finding wage employment. In this regard, African women and Coloured women were reported to be more educated, therefore this increased their endowments of productive characteristics than their male counterparts. African women also enjoyed benefits from high-paying employment as well as top-level positions. Based on their productive traits, the wage decomposition by gender showed that the unexplained component of the male-female wage difference never showed a downward trend, especially among Africans and Coloureds, which means that gender discrimination still took place after the transition.

To conclude, the studies discussed above linked higher education with increased chances of finding employment as well as higher earnings. Having many dependants was associated with a reduced likelihood of finding employment, while marriage increased the chances of finding wage employment. Being young, living in urban areas as well as living in the Eastern Cape and Limpopo provinces led to fewer chances of finding employment. Africans were affected more by unemployment than any other race group. Whites, men and those involved in highly skilled occupations earned more. The studies also found that the unexplained component of the employment gap and the wage gap by gender, and union membership had not shown any signs of decrease since the transition, as Whites, men and those with union membership earned more on average, even after controlling for differences in characteristics.

The next chapter would use all available OHSs/LFSs/QLFSs to investigate labour market trends since transition, with specific focus on gender.

# CHAPTER 3: LABOUR MARKET TRENDS IN SOUTH AFRICA

## 3.1 Introduction

This chapter investigates the labour market trends by gender since 1995, focusing on the LF, LFPR, the employed and their earnings and work activities, the number of unemployed and unemployment rates, using all the available OHSs, LFSs and the QLFSs between 1995 and 2009.

## 3.2 Labour market status derivation

Table 1 summarizes the derivation of the narrow and broad LFPRs as well as unemployment rates in OHSs, LFSs, and QLFSs. Detailed discussions on the derivation of the labour market status in each survey could be found in Yu (2007 and 2009). Over the years, Stats SA identified narrow unemployed as those who have been without work seven days prior to the interview, currently available for work within a week of the interview as well as actively sought for work prior to the interview. However, Barker (1999) noted that this definition excludes the discouraged job seekers (i.e. workers who 'have not taken active step to search for work' but do want to work). The unemployment rate is measured as the number of unemployed expressed as a percentage of the total LF.

Table 1: Derivation of narrow and broad labour force participation rates and unemployment rates in OHSs, LFSs, and QLFSs

| Labour market status |
|---|
| (1): Employed (2): Unemployed (3): Discouraged job seekers* (4): Inactive |
| **Narrow labour force participation rate** <br> = Labour force** / Working-age population = $\dfrac{(1)+(2)}{(1)+(2)+(3)+(4)}$ |
| **Broad labour force participation rate** <br> = Labour force / Working-age population = $\dfrac{(1)+(2)+(3)}{(1)+(2)+(3)+(4)}$ |
| **Narrow unemployment rate** <br> = Narrow unemployed / Narrow labour force = $\dfrac{(2)}{(1)+(2)}$ |
| **Broad Unemployment rate** <br> = Broad unemployed / Broad labour force = $\dfrac{(2)+(3)}{(1)+(2)+(3)}$ |

* These people were defined as inactive and unemployed under the narrow and broad definitions respectively.
** Labour force (LF), also known as economically active population (EAP), stands for the total number of people in the working ages (15-65 years) who are willing and able to work.

A combination of better capturing of data of the employed (especially the self-employed) as well as improvement of the questionnaire throughout the years led to the better collection of labour market data (See Table 2). Yu (2007) argued that in OHS1995-1996, the questionnaire sought to identify whether the respondent did any full-time or part-time job in the last seven days, but some self-employed and/or informal workers did not understand the meaning of these words, and ended up thinking their work hours were too short to be defined as employed, so they eventually claimed they were not working and could be wrongly classified as inactive or unemployed by Stats SA. OHS1997 and OHS1998 improved by adding a third option of 'casual work' as part of the respondent's choices. However, there was no further clarification on the type of work that would classify as casual. In 1999, 'seasonal work' was added in an effort to widen the respondent's choices. The LFSs and the QLFSs further broke down the type of work one engaged into different activities and clearly indicated that the respondent would be defined as employed if he/she worked at least one hour in the last seven days. This helps capturing the self-employed and informal employment better.

Table 2: The answers that must be provided by the respondents before they were immediately defined as employed, OHS1995-QLFS2009Q4

| **OHS1995 - OHS1996** |
|---|
| Now I am going to ask questions about…. activities. What did … do most during the last 7 days? |
|     1. Working full-time |
|     2. Working part-time |
| **OHS1997 - OHS1998** |
| During the past 7 days, did (the person) do work for pay, profit or family gain? |
|     1. Yes, full-time |
|     2. Yes, part-time |
|     3. Yes, casual |
| **OHS1999** |
| During the past 7 days, did (the person) do work for pay, profit or family gain? |
|     1. Yes, full-time |
|     2. Yes, part-time |
|     3. Yes, casual/seasonal |
| **LFS2000a - LFS2007b** |
| In the last past 7 days, did…… do any of the following activities, even only for one hour? |
|     1. Run or do any kind of business, big or small for himself / herself? |
|     2. Do any of work for a wage salary, commission or any payment in kind? |
|     3. Do any work as a domestic worker for a wage, salary or any pay payment in kind? |
|     4. Help unpaid in a family business of any kind? |
|     5. Do any works on his/her own or a family's plot, farm, food garden cattle post or a kraal or help in growing farm produce or in looking after animals for the household? |
|     6. Do any construction or major repair work on his/her own home, plot, cattle post or business or those of the family? |
|     7. Catch any fish, prawns, shells, wild animals or other food for sale or family food? |

Sources: Yu (2007:47) and Stats SA (2008)

Table 2: Continued

QLFS2008Q1 – QLFS2009Q4

In the last week,

1: Did you work for a wage, salary, commission or any payment in kind (including paid domestic work), even if it was for only one hour?

*Examples: A regular job, contract, casual or piece work for pay, work in exchange for food or housing, paid domestic work.*

2: Did you run or do any kind of business, big or small, for yourself or with one or more partners, even if it was for only one hour?

*Examples: Commercial farming, selling things, making things for sale, construction, repairing things, guarding cards, brewing beer, collecting wood or water for sale, hair dressing, crèche businesses, taxi or other transport business, having a legal or medical practice, performing in public, having a public phone shop, etc.*

3: Did you help without being paid in any kind of business run by your household, even if it was for only one hour?

*Examples: Commercial farming, help to sell things, make things for sale or exchange, doing the accounts, cleaning up for the business, etc.*

Yu (2009) also found that the QLFS broad labour market status derivation method was incomparable with the broad OHS/LFS method. Against this background, the remainder of this chapter focuses on the narrow definition[19] of labour market status and derives the South African labour market trends by specifically looking at the demographic (marital status, age), location and educational attainment of the LF, employed and unemployed.

## 3.3 Characteristics of the labour force

The demographic characteristics of the LF are discussed in this section. Table 3 presents the number of working-age population, LF, LFPR and gender shares of LF. During the OHS years, the working-age population recorded increases in both genders, with the male population dominating all the increases except for the OHS1996. With respect to the LFS years, the LF numbers of both genders showed a steady increase. Finally, in the QLFSs, the male working-age population stabilized at the 14.6-15.0 million ranges, while the female working-age population fluctuated in the 16.1-16.5 million ranges.

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[19] Figures A.1 in Appendix shows abrupt declines in the broad LFPR between LFS2007b and QLFS2008Q1.

Table 3: The South African narrow labour force, 1995-2009

| | 15-65 years (1000s) | | LF (1000s) | | LFPR | | % share | |
|---|---|---|---|---|---|---|---|---|
| | Male | Female | Male | Female | Male | Female | Male | Female |
| OHS1995 | 11,526 | 12,663 | 6,712 | 4,814 | 58.2% | 38.0% | 58.2% | 41.8% |
| OHS1996 | 11,717 | 13,191 | 6,355 | 4,834 | 54.2% | 36.7% | 56.8% | 43.2% |
| OHS1997 | 12,211 | 13,294 | 6,707 | 4,836 | 54.9% | 36.4% | 58.1% | 41.9% |
| OHS1998 | 12,292 | 13,372 | 7,181 | 5,346 | 58.4% | 40.0% | 57.3% | 42.7% |
| OHS1999 | 12,591 | 13,638 | 7,479 | 6,023 | 59.4% | 44.2% | 55.4% | 44.6% |
| LFS2000a | 12,622 | 13,837 | 8,384 | 7,815 | 66.4% | 56.5% | 51.8% | 48.2% |
| LFS2000b | 13,484 | 14,348 | 8,916 | 7,464 | 66.1% | 52.0% | 54.4% | 45.6% |
| LFS2001a | 13,641 | 14,416 | 8,987 | 7,677 | 65.9% | 53.3% | 53.9% | 46.1% |
| LFS2001b | 13,599 | 14,485 | 8,667 | 7,149 | 63.7% | 49.4% | 54.8% | 45.2% |
| LFS2002a | 13,680 | 14,615 | 8,926 | 7,567 | 65.2% | 51.8% | 54.1% | 45.9% |
| LFS2002b | 13,887 | 14,598 | 8,920 | 7,288 | 64.2% | 49.9% | 55.0% | 45.0% |
| LFS2003a | 13,957 | 14,763 | 8,953 | 7,453 | 64.1% | 50.5% | 54.6% | 45.4% |
| LFS2003b | 13,982 | 14,924 | 8,770 | 7,070 | 62.7% | 47.4% | 55.4% | 44.6% |
| LFS2004a | 14,061 | 15,029 | 8,710 | 7,073 | 61.9% | 47.1% | 55.2% | 44.8% |
| LFS2004b | 14,178 | 15,078 | 8,791 | 6,961 | 62.0% | 46.2% | 55.8% | 44.2% |
| LFS2005a | 14,227 | 15,244 | 8,898 | 7,267 | 62.5% | 47.7% | 55.0% | 45.0% |
| LFS2005b | 14,280 | 15,360 | 9,103 | 7,660 | 63.7% | 49.9% | 54.3% | 45.7% |
| LFS2006a | 14,398 | 15,414 | 9,056 | 7,649 | 62.9% | 49.6% | 54.2% | 45.8% |
| LFS2006b | 14,514 | 15,455 | 9,277 | 7,895 | 63.9% | 51.1% | 54.0% | 46.0% |
| LFS2007a | 14,609 | 15,549 | 9,205 | 7,760 | 63.0% | 49.9% | 54.3% | 45.7% |
| LFS2007b | 14,674 | 15,695 | 9,378 | 7,805 | 63.9% | 49.7% | 54.6% | 45.4% |
| QLFS2008Q1 | 14,629 | 16,134 | 9,621 | 8,204 | 65.8% | 50.9% | 54.0% | 46.0% |
| QLFS2008Q2 | 14,690 | 16,184 | 9,622 | 8,241 | 65.5% | 50.9% | 53.9% | 46.1% |
| QLFS2008Q3 | 14,739 | 16,210 | 9,604 | 8,183 | 65.2% | 50.5% | 54.0% | 46.0% |
| QLFS2008Q4 | 14,790 | 16,256 | 9,560 | 8,171 | 64.6% | 50.3% | 53.9% | 46.1% |
| QLFS2009Q1 | 14,837 | 16,307 | 9,618 | 8,214 | 64.8% | 50.4% | 53.9% | 46.1% |
| QLFS2009Q2 | 14,888 | 16,356 | 9,466 | 8,043 | 63.6% | 49.2% | 54.1% | 45.9% |
| QLFS2009Q3 | 14,938 | 16,386 | 9,220 | 7,866 | 61.7% | 48.0% | 54.0% | 46.0% |
| QLFS2009Q4 | 14,985 | 16,424 | 9,323 | 7,822 | 62.2% | 47.6% | 54.4% | 45.6% |

Source: Own calculations using OHS, LFS and QLFS data.

The number of male LF was always higher than the female LF during the entire period under study. The (male LF – female LF) difference also did not reflect any signs of narrowing, implying no feminization. However, during the transformation from the OHS to the LFS, the female LF experienced a greater increase (from 6.0 million to 7.8 million – an increase of 1.8 million, while the male LF only increased by 0.9 million). The LF numbers in both genders during the LFS and the QLFS years were characterized by fluctuations. In addition, both genders recorded moderate increase in LF during the transformation from the LFS to the QLFS, but the increase was higher for females. Finally, LF of both genders decreased continuously in the first three quarters of 2009 and this was linked to the recent global economic recession. It can be concluded that the LF was not feminized since the transition.

The narrow LFPRs by gender is presented in Figure 1. The male LFPR is always higher than

that of their female LFPR between 1995 and 2009. However, the male LFPR recorded an abrupt decrease by four percentage points between 1995 and 1996. The highest increase was recorded during the changeover between the OHS and the LFS. During this transformation, women's LFPR increased by 12.3 percentage points in LFS2000a compared to 6.2 percentage points between OHS1995 and OHS1999, while males recorded seven percentage points compared to the 1.2 percentage point recorded during the same period. The long-term trend displays similar directional movements for both genders indicating a stable movement. In this regard, the gap between the male and the female LFPRs did not show any signs of narrowing, contradicting the conclusions by recent studies such as Casale and Posel (2002), Burger and Woolard (2004), Oosthuizen (2006) and Goga et al (2007).

Figure 1: Narrow labour force participation rates by gender, 1995-2009
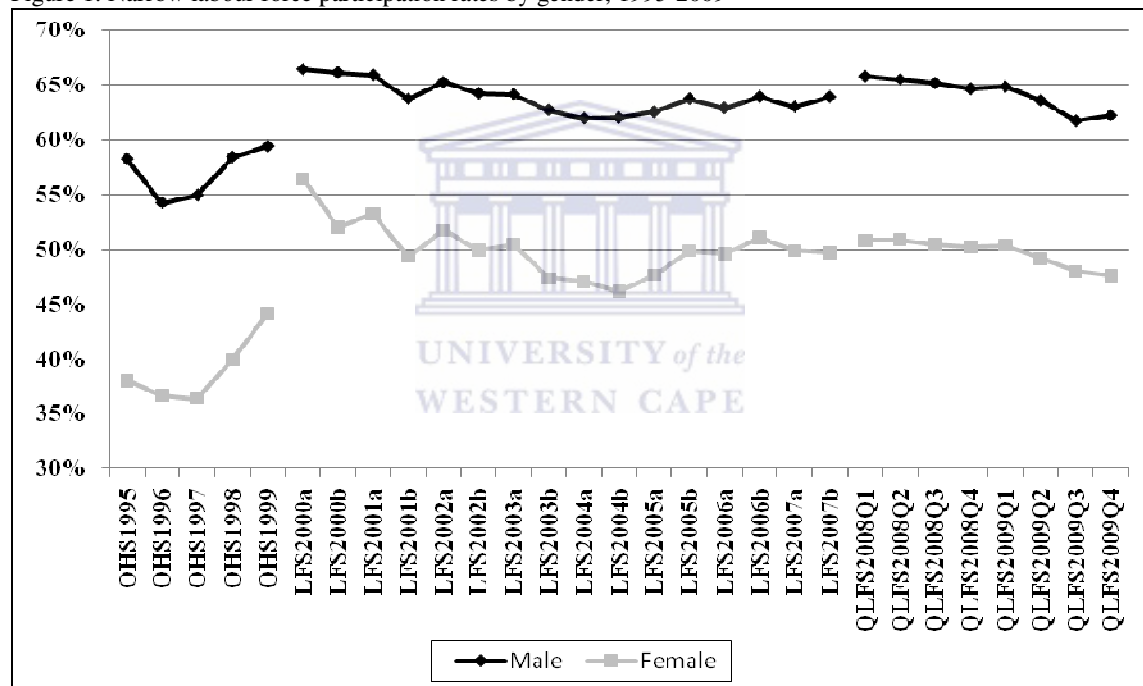


Source: Own calculations using OHS, LFS and QLFS data.

With regard to gender share of the LF (See the last two columns of Table 3), the male share always exceeded 50% in all surveys. In fact, since LFS2000b, the female share of the LF stabilized at about 45%, which indicates that feminization of the LF did not take place.

The LF by various demographic characteristics in each gender is discussed for the remainder of 3.3. First, the LF number experienced an upward trend in general in all four races. Africans accounted for the bulk of the LF, as their share of the LF increased from below 70% in OHS1995 to nearly three quarters in the LFSs/QLFSs in both genders. Table 4 presents the

racial LFPRs by gender between 1995 and 2009; the LFPRs were higher in the Whites and Coloureds groups. The female LFPRs were always lower than the male LFPRs in all races, once again indicating that feminization of the South African LF did not occur.

Table 4: Narrow labour force participation rates by gender and race, 1995-2009

|  | Male | | | | Females | | | |
|---|---|---|---|---|---|---|---|---|
|  | African | Coloured | Indian | White | African | Coloured | Indian | White |
| OHS1995 | 52.9% | 70.0% | 76.9% | 75.8% | 34.3% | 51.0% | 37.1% | 51.2% |
| OHS1996 | 48.2% | 68.2% | 69.5% | 74.6% | 32.3% | 50.5% | 37.7% | 53.1% |
| OHS1997 | 49.5% | 67.2% | 71.3% | 74.1% | 32.7% | 47.9% | 38.4% | 50.2% |
| OHS1998 | 53.9% | 68.2% | 73.6% | 74.9% | 36.7% | 49.1% | 36.7% | 55.2% |
| OHS1999 | 54.6% | 71.3% | 75.2% | 76.3% | 40.5% | 54.6% | 47.0% | 59.3% |
| LFS2000a | 63.2% | 73.9% | 78.6% | 77.3% | 55.6% | 62.1% | 50.5% | 59.2% |
| LFS2000b | 63.2% | 74.0% | 76.3% | 76.1% | 50.5% | 56.7% | 46.4% | 60.3% |
| LFS2001a | 62.7% | 73.4% | 76.2% | 77.9% | 52.1% | 58.3% | 48.5% | 58.5% |
| LFS2001b | 59.9% | 73.2% | 77.2% | 77.4% | 47.0% | 56.0% | 49.2% | 60.4% |
| LFS2002a | 61.7% | 74.9% | 73.9% | 78.1% | 49.8% | 60.1% | 47.7% | 59.9% |
| LFS2002b | 60.6% | 74.1% | 76.9% | 76.6% | 48.0% | 55.9% | 52.7% | 58.4% |
| LFS2003a | 60.5% | 72.7% | 76.2% | 78.5% | 48.1% | 60.0% | 49.0% | 60.2% |
| LFS2003b | 58.8% | 71.4% | 76.4% | 79.4% | 44.6% | 56.1% | 48.1% | 59.7% |
| LFS2004a | 58.1% | 71.9% | 75.2% | 76.8% | 44.4% | 56.8% | 44.4% | 58.8% |
| LFS2004b | 58.2% | 69.1% | 75.8% | 78.7% | 43.5% | 55.4% | 41.4% | 58.9% |
| LFS2005a | 58.8% | 70.6% | 75.2% | 78.7% | 45.3% | 56.1% | 46.6% | 58.5% |
| LFS2005b | 60.4% | 72.8% | 76.9% | 76.4% | 48.0% | 55.8% | 48.1% | 59.4% |
| LFS2006a | 59.5% | 70.7% | 76.2% | 76.9% | 47.8% | 56.5% | 42.4% | 59.6% |
| LFS2006b | 61.0% | 71.2% | 73.3% | 75.9% | 49.3% | 58.0% | 47.0% | 59.8% |
| LFS2007a | 60.1% | 70.1% | 70.7% | 77.1% | 48.1% | 58.5% | 40.9% | 58.7% |
| LFS2007b | 60.7% | 68.3% | 78.4% | 79.9% | 47.6% | 56.0% | 40.7% | 62.9% |
| QLFS2008Q1 | 62.5% | 74.7% | 73.4% | 78.9% | 48.8% | 57.0% | 46.6% | 62.2% |
| QLFS2008Q2 | 62.4% | 74.4% | 73.6% | 77.4% | 49.2% | 55.9% | 47.5% | 60.6% |
| QLFS2008Q3 | 61.9% | 73.7% | 77.1% | 77.7% | 48.8% | 55.7% | 46.6% | 59.9% |
| QLFS2008Q4 | 61.7% | 72.8% | 72.9% | 76.5% | 48.4% | 56.6% | 46.7% | 60.2% |
| QLFS2009Q1 | 61.4% | 74.1% | 75.5% | 78.1% | 48.2% | 58.7% | 44.1% | 61.8% |
| QLFS2009Q2 | 60.1% | 72.9% | 73.5% | 77.6% | 47.0% | 57.5% | 42.1% | 60.9% |
| QLFS2009Q3 | 58.2% | 72.1% | 73.8% | 74.5% | 45.7% | 56.9% | 41.1% | 60.0% |
| QLFS2009Q4 | 58.6% | 73.1% | 71.7% | 76.7% | 45.2% | 57.0% | 40.2% | 60.2% |

Source: Own calculations using OHS, LFS and QLFS data.

With regard to the share of LF by age category, both genders recorded their highest shares (i.e. an average of 80% for males and 65% for females) in the 25-34 years old and 35-44 years categories during the entire period of the study. The changeover from the LFS to the QLFS did not result in any drastic changes in both gender shares of the LF. The LFPRs by age category, presented in Table 5, shows that, in all age cohorts, the male LFPRs were always higher than the females, implying no signs of feminization. The 15-24 years olds and the 55-65 years olds recorded the lowest LFPRs.

Table 5: Narrow labour force participation rates by gender and age category, 1995-2009

| | **Male** | | | | | **Female** | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | 15-24 years | 25-34 years | 35-44 years | 45-54 years | 55-65 years | 15-24 years | 25-34 years | 35-44 years | 45-54 years | 55-65 years |
| OHS1995 | 24.0% | 76.2% | 84.8% | 80.0% | 49.1% | 19.5% | 52.5% | 55.3% | 46.8% | 19.4% |
| OHS1996 | 22.2% | 71.5% | 81.2% | 74.3% | 45.9% | 18.5% | 50.0% | 54.1% | 43.3% | 19.2% |
| OHS1997 | 22.1% | 71.7% | 79.1% | 74.0% | 47.5% | 17.3% | 50.0% | 54.1% | 43.6% | 17.8% |
| OHS1998 | 25.6% | 77.6% | 83.1% | 77.8% | 47.1% | 20.4% | 55.9% | 57.8% | 48.4% | 19.7% |
| OHS1999 | 26.9% | 78.0% | 83.9% | 78.4% | 49.3% | 24.0% | 60.2% | 63.3% | 52.6% | 23.0% |
| LFS2000a | 37.7% | 85.6% | 87.2% | 84.7% | 58.5% | 33.0% | 72.0% | 75.5% | 66.2% | 40.3% |
| LFS2000b | 34.6% | 84.8% | 88.6% | 83.6% | 61.5% | 29.1% | 67.8% | 70.5% | 63.0% | 35.1% |
| LFS2001a | 34.9% | 85.1% | 87.9% | 83.0% | 58.7% | 30.1% | 69.1% | 72.8% | 62.3% | 36.8% |
| LFS2001b | 32.1% | 84.2% | 86.9% | 79.6% | 55.0% | 28.9% | 66.6% | 67.2% | 56.1% | 27.1% |
| LFS2002a | 35.0% | 84.3% | 87.4% | 81.4% | 55.6% | 31.3% | 67.6% | 70.3% | 59.8% | 30.7% |
| LFS2002b | 33.4% | 84.3% | 86.9% | 78.9% | 53.6% | 29.2% | 66.8% | 68.4% | 57.3% | 27.9% |
| LFS2003a | 33.1% | 84.7% | 86.6% | 79.4% | 52.1% | 29.7% | 67.7% | 69.3% | 57.8% | 27.5% |
| LFS2003b | 31.3% | 82.7% | 85.7% | 78.3% | 51.8% | 27.3% | 63.8% | 64.2% | 55.8% | 25.9% |
| LFS2004a | 30.0% | 81.7% | 85.5% | 77.8% | 52.2% | 27.6% | 63.8% | 62.9% | 54.1% | 26.5% |
| LFS2004b | 30.7% | 82.6% | 83.5% | 78.5% | 51.0% | 25.8% | 60.3% | 64.1% | 55.7% | 27.3% |
| LFS2005a | 30.3% | 82.5% | 85.0% | 77.8% | 57.2% | 26.2% | 64.2% | 64.5% | 57.1% | 28.1% |
| LFS2005b | 32.9% | 83.3% | 85.9% | 79.2% | 54.6% | 28.4% | 66.7% | 66.0% | 60.7% | 28.7% |
| LFS2006a | 31.4% | 83.4% | 83.9% | 79.2% | 54.5% | 28.3% | 65.9% | 65.8% | 58.9% | 30.7% |
| LFS2006b | 32.2% | 83.0% | 87.4% | 81.4% | 54.6% | 28.9% | 67.6% | 68.1% | 60.6% | 31.5% |
| LFS2007a | 32.3% | 82.8% | 85.1% | 78.5% | 53.8% | 27.8% | 67.4% | 66.7% | 57.6% | 30.4% |
| LFS2007b | 32.0% | 83.8% | 86.4% | 80.4% | 56.3% | 27.4% | 65.8% | 68.3% | 60.3% | 28.1% |
| QLFS2008Q1 | 34.2% | 86.0% | 88.9% | 81.5% | 56.0% | 28.0% | 67.3% | 69.5% | 59.8% | 31.0% |
| QLFS2008Q2 | 33.8% | 85.8% | 88.5% | 82.0% | 55.3% | 27.9% | 67.9% | 69.0% | 59.4% | 32.0% |
| QLFS2008Q3 | 33.0% | 85.0% | 89.0% | 82.8% | 54.8% | 27.3% | 67.9% | 69.0% | 58.2% | 31.1% |
| QLFS2008Q4 | 32.1% | 85.7% | 87.5% | 82.3% | 54.5% | 26.8% | 67.3% | 69.2% | 59.4% | 30.4% |
| QLFS2009Q1 | 32.8% | 84.9% | 87.9% | 82.2% | 55.6% | 26.5% | 67.2% | 69.1% | 60.5% | 30.9% |
| QLFS2009Q2 | 31.2% | 83.4% | 87.6% | 81.9% | 53.3% | 25.9% | 65.4% | 68.3% | 58.5% | 30.1% |
| QLFS2009Q3 | 28.6% | 82.6% | 86.3% | 79.0% | 51.8% | 24.2% | 63.8% | 68.4% | 57.9% | 28.6% |
| QLFS2009Q4 | 29.4% | 83.0% | 85.8% | 81.0% | 51.2% | 24.1% | 63.5% | 67.7% | 56.7% | 29.0% |

Source: Own calculations using OHS, LFS and QLFS data.

Information on LF by educational attainment is presented in Figures 2 and 3 as well as Tables 6 and 7. Firstly, Figure 2 shows the percentage of the LF with at least Matric while Figure 3 presents the mean years of education of the LF. Figure 2 show that, from 1995 to 2009, the percentages of individuals with at least Matric ranged between 30% and 50%. However, this proportion was always higher in the case of female LF. Moreover, Figure 3 shows that the mean years of education for both genders increased between 1995 and 2009, but females' mean years of education was slightly higher in all surveys, except during the transformation from the OHS to the LFS. Secondly, Table 6 and Table 7 present the males LFPRs and females LFPRs by educational attainment respectively, and it can be seen that, in both genders, a higher educational is associated with greater likelihood of labour force participation, as expected.

Figure 2: Percentage of narrow labour force with at least Matric by gender, 1995-2009
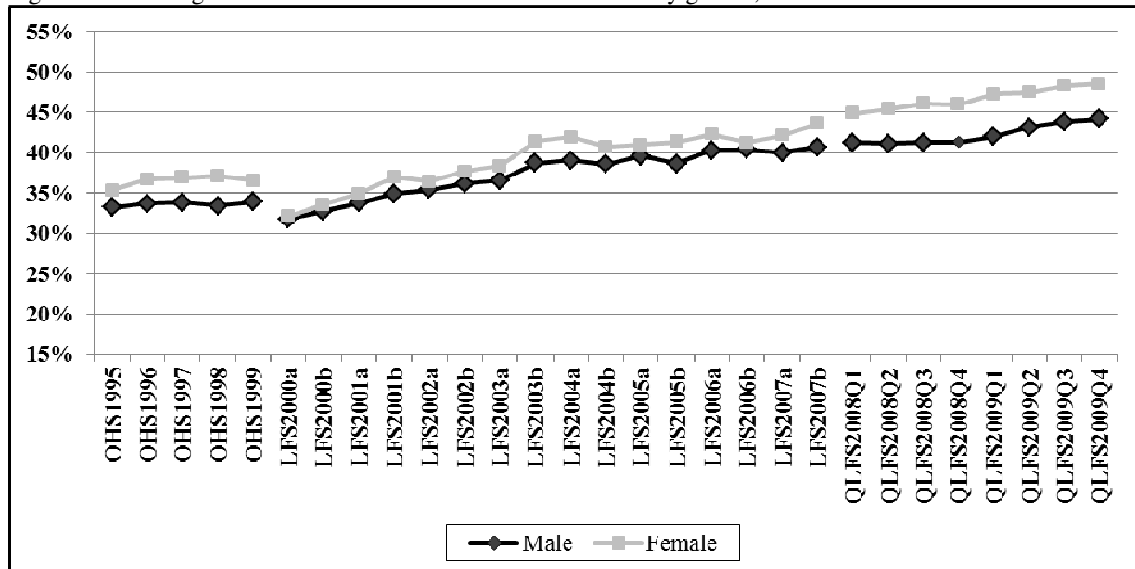


Source: Own calculations using OHS, LFS and QLFS data.

Figure 3: Mean years of education of narrow labour force by gender, 1995-2009
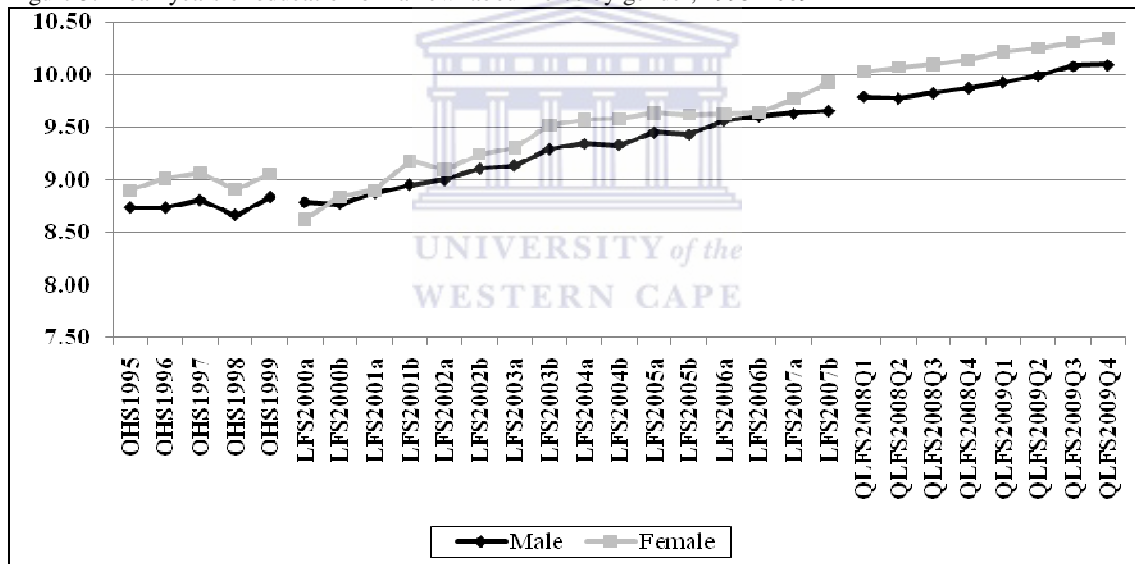


Source: Own calculations using OHS, LFS and QLFS data.

Table 6: Male narrow labour force participation rates by educational attainment, 1995-2009

|  | No schooling | Incomplete primary | Incomplete secondary | Matric | Matric + Cert/Dip | Degree |
|---|---|---|---|---|---|---|
| OHS1995 | 58.9% | 58.0% | 49.4% | 70.5% | 84.3% | 87.2% |
| OHS1996 | 52.3% | 49.2% | 47.1% | 67.0% | 85.4% | 87.1% |
| OHS1997 | 52.9% | 49.1% | 47.2% | 69.3% | 88.1% | 87.5% |
| OHS1998 | 58.0% | 55.6% | 49.6% | 72.8% | 87.6% | 90.0% |
| OHS1999 | 58.5% | 55.0% | 50.4% | 73.5% | 87.9% | 90.5% |
| LFS2000a | 68.8% | 65.9% | 57.9% | 77.8% | 90.2% | 91.7% |
| LFS2000b | 67.6% | 64.9% | 57.2% | 78.2% | 90.6% | 91.5% |
| LFS2001a | 67.9% | 63.5% | 57.1% | 78.5% | 89.2% | 90.4% |
| LFS2001b | 60.8% | 59.5% | 55.0% | 79.5% | 86.4% | 91.6% |
| LFS2002a | 64.5% | 62.5% | 56.1% | 78.3% | 91.0% | 91.4% |
| LFS2002b | 62.7% | 59.1% | 55.3% | 79.1% | 89.0% | 93.5% |

Table 6: Continued

|  | No schooling | Incomplete primary | Incomplete secondary | Matric | Matric + Cert/Dip | Degree |
|---|---|---|---|---|---|---|
| LFS2003a | 59.5% | 62.5% | 54.5% | 77.7% | 92.4% | 93.3% |
| LFS2003b | 56.7% | 56.6% | 53.3% | 79.0% | 91.5% | 93.8% |
| LFS2004a | 54.7% | 56.4% | 52.8% | 77.3% | 91.5% | 90.9% |
| LFS2004b | 55.9% | 54.8% | 53.0% | 78.2% | 90.6% | 90.9% |
| LFS2005a | 55.2% | 58.2% | 53.3% | 77.3% | 88.8% | 89.7% |
| LFS2005b | 56.3% | 58.0% | 55.2% | 79.1% | 91.5% | 85.2% |
| LFS2006a | 56.0% | 58.3% | 53.7% | 77.0% | 89.0% | 89.2% |
| LFS2006b | 55.6% | 58.4% | 54.5% | 79.4% | 89.8% | 91.8% |
| LFS2007a | 54.0% | 58.2% | 54.1% | 77.5% | 90.4% | 89.6% |
| LFS2007b | 58.1% | 57.8% | 53.7% | 78.8% | 92.1% | 96.0% |
| QLFS2008Q1 | 54.3% | 61.2% | 56.0% | 80.2% | 93.3% | 92.1% |
| QLFS2008Q2 | 57.1% | 59.3% | 55.6% | 80.1% | 93.6% | 92.7% |
| QLFS2008Q3 | 53.3% | 57.5% | 55.7% | 80.9% | 92.4% | 94.3% |
| QLFS2008Q4 | 53.9% | 55.2% | 55.3% | 80.0% | 93.1% | 93.2% |
| QLFS2009Q1 | 53.8% | 56.6% | 56.1% | 77.3% | 93.7% | 91.9% |
| QLFS2009Q2 | 51.8% | 54.5% | 54.0% | 78.7% | 92.4% | 92.1% |
| QLFS2009Q3 | 48.8% | 51.4% | 51.9% | 77.0% | 92.0% | 90.4% |
| QLFS2009Q4 | 50.0% | 49.7% | 52.5% | 78.4% | 91.0% | 92.7% |

Source: Own calculations using OHS, LFS and QLFS data.

Table 7: Female narrow labour force participation rates by educational attainment, 1995-2009

|  | No schooling | Incomplete primary | Incomplete secondary | Matric | Matric + Cert/Dip | Degree |
|---|---|---|---|---|---|---|
| OHS1995 | 58.9% | 58.0% | 49.4% | 70.5% | 84.3% | 87.2% |
| OHS1996 | 52.3% | 49.2% | 47.1% | 67.0% | 85.4% | 87.1% |
| OHS1997 | 52.9% | 49.1% | 47.2% | 69.3% | 88.1% | 87.5% |
| OHS1998 | 58.0% | 55.6% | 49.6% | 72.8% | 87.6% | 90.0% |
| OHS1999 | 58.5% | 55.0% | 50.4% | 73.5% | 87.9% | 90.5% |
| LFS2000a | 68.8% | 65.9% | 57.9% | 77.8% | 90.2% | 91.7% |
| LFS2000b | 67.6% | 64.9% | 57.2% | 78.2% | 90.6% | 91.5% |
| LFS2001a | 67.9% | 63.5% | 57.1% | 78.5% | 89.2% | 90.4% |
| LFS2001b | 60.8% | 59.5% | 55.0% | 79.5% | 86.4% | 91.6% |
| LFS2002a | 64.5% | 62.5% | 56.1% | 78.3% | 91.0% | 91.4% |
| LFS2002b | 62.7% | 59.1% | 55.3% | 79.1% | 89.0% | 93.5% |
| LFS2003a | 59.5% | 62.5% | 54.5% | 77.7% | 92.4% | 93.3% |
| LFS2003b | 56.7% | 56.6% | 53.3% | 79.0% | 91.5% | 93.8% |
| LFS2004a | 54.7% | 56.4% | 52.8% | 77.3% | 91.5% | 90.9% |
| LFS2004b | 55.9% | 54.8% | 53.0% | 78.2% | 90.6% | 90.9% |
| LFS2005a | 55.2% | 58.2% | 53.3% | 77.3% | 88.8% | 89.7% |
| LFS2005b | 56.3% | 58.0% | 55.2% | 79.1% | 91.5% | 85.2% |
| LFS2006a | 56.0% | 58.3% | 53.7% | 77.0% | 89.0% | 89.2% |
| LFS2006b | 55.6% | 58.4% | 54.5% | 79.4% | 89.8% | 91.8% |
| LFS2007a | 54.0% | 58.2% | 54.1% | 77.5% | 90.4% | 89.6% |
| LFS2007b | 58.1% | 57.8% | 53.7% | 78.8% | 92.1% | 96.0% |
| QLFS2008Q1 | 54.3% | 61.2% | 56.0% | 80.2% | 93.3% | 92.1% |
| QLFS2008Q2 | 57.1% | 59.3% | 55.6% | 80.1% | 93.6% | 92.7% |
| QLFS2008Q3 | 53.3% | 57.5% | 55.7% | 80.9% | 92.4% | 94.3% |
| QLFS2008Q4 | 53.9% | 55.2% | 55.3% | 80.0% | 93.1% | 93.2% |
| QLFS2009Q1 | 53.8% | 56.6% | 56.1% | 77.3% | 93.7% | 91.9% |
| QLFS2009Q2 | 51.8% | 54.5% | 54.0% | 78.7% | 92.4% | 92.1% |
| QLFS2009Q3 | 48.8% | 51.4% | 51.9% | 77.0% | 92.0% | 90.4% |
| QLFS2009Q4 | 50.0% | 49.7% | 52.5% | 78.4% | 91.0% | 92.7% |

Source: Own calculations using OHS, LFS and QLFS data.

The provincial shares of the LF did not show much change for most parts of the period under investigation as nearly two-thirds of the LF come from the Western Cape, KwaZulu-Natal and the Gauteng provinces. On the other hand, since the provincial LFPRs have been very stable, Figure 4 only presents what happened in QLFS2009Q4, and it can be seen that the male LFPRs were higher in all provinces. Also, the LFPRs were highest in Western Cape and Gauteng for both genders.

Figure 4: Narrow labour force participation rates by gender and province, QLFS2009Q4
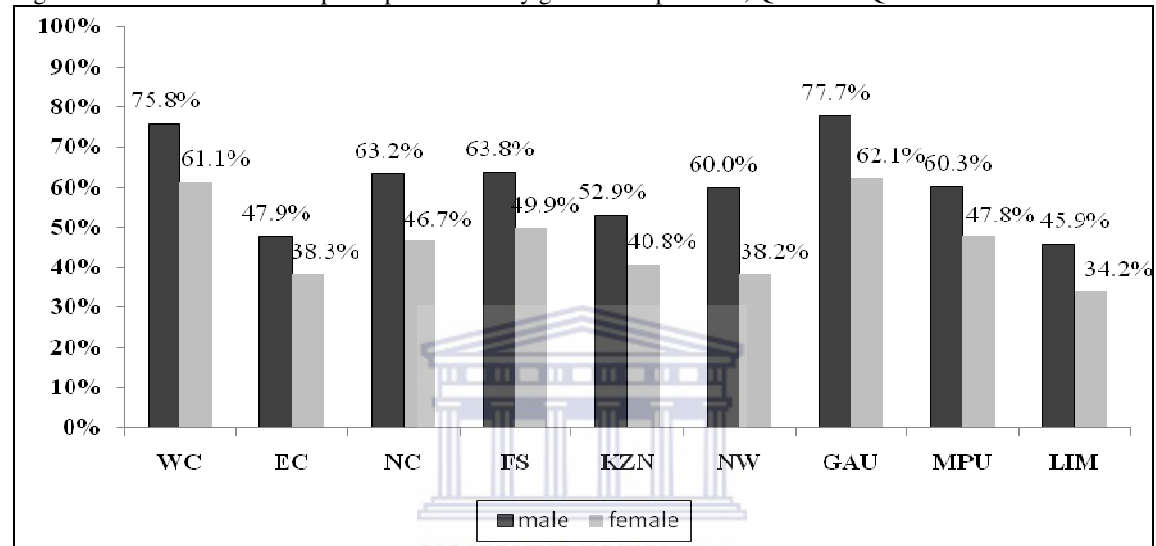


Source: Own calculations using QLFS2009Q4 data.

Shares of LF by marital status showed that the share of unmarried women experienced an increase. This is in line with the findings by Poswell (2002). With respect to LFPR by marital status in each gender (See Table 8), the male LFPRs continued to be higher than that of the females for the period of study, regardless of the marital status.

Table 8: Narrow labour force participation rates by gender and marital status, 1995-2009

|  | Male | | | Female | | |
|---|---|---|---|---|---|---|
|  | **Never married** | **Married or live together** | **Other** | **Never married** | **Married or live together** | **Other** |
| OHS1995 | 37.4% | 83.5% | 64.4% | 30.6% | 44.4% | 46.5% |
| OHS1996 | 34.9% | 78.4% | 58.1% | 30.0% | 42.2% | 44.2% |
| OHS1997 | 35.5% | 80.2% | 60.9% | 30.4% | 41.5% | 44.3% |
| OHS1998 | 40.0% | 81.8% | 64.7% | 32.9% | 46.3% | 47.8% |
| OHS1999 | 42.0% | 82.7% | 66.5% | 37.9% | 50.4% | 50.9% |
| LFS2000a | 52.1% | 87.1% | 71.9% | 48.8% | 65.0% | 62.3% |
| LFS2000b | 50.0% | 87.9% | 72.8% | 44.3% | 59.2% | 59.8% |
| LFS2001a | 50.6% | 86.6% | 69.6% | 45.6% | 60.4% | 60.6% |
| LFS2001b | 48.5% | 84.6% | 71.1% | 44.4% | 54.6% | 52.4% |
| LFS2002a | 50.4% | 85.4% | 69.1% | 45.5% | 58.0% | 56.8% |
| LFS2002b | 49.6% | 84.4% | 65.7% | 44.5% | 55.6% | 53.2% |

Table 8: Continued

| | Male | | | Female | | |
|---|---|---|---|---|---|---|
| | **Never married** | **Married or live together** | **Other** | **Never married** | **Married or live together** | **Other** |
| LFS2003a | 50.0% | 84.0% | 65.7% | 45.4% | 56.2% | 52.6% |
| LFS2003b | 47.9% | 83.3% | 65.1% | 41.8% | 53.3% | 50.8% |
| LFS2004a | 46.8% | 83.3% | 64.9% | 42.6% | 52.2% | 49.3% |
| LFS2004b | 47.2% | 82.1% | 66.4% | 40.5% | 52.2% | 49.2% |
| LFS2005a | 47.6% | 83.4% | 66.2% | 41.8% | 54.4% | 50.3% |
| LFS2005b | 49.7% | 83.7% | 65.2% | 43.5% | 57.4% | 53.1% |
| LFS2006a | 49.2% | 83.6% | 66.5% | 44.0% | 56.5% | 52.0% |
| LFS2006b | 50.0% | 84.9% | 64.4% | 45.4% | 58.0% | 53.6% |
| LFS2007a | 49.8% | 83.6% | 62.8% | 44.7% | 57.0% | 49.9% |
| LFS2007b | 50.1% | 85.0% | 60.6% | 44.2% | 57.1% | 49.6% |
| QLFS2008Q1 | 52.8% | 84.5% | 67.5% | 45.5% | 57.4% | 52.4% |
| QLFS2008Q2 | 52.8% | 84.7% | 67.0% | 46.0% | 57.7% | 51.7% |
| QLFS2008Q3 | 52.0% | 85.2% | 69.5% | 46.2% | 56.4% | 50.9% |
| QLFS2008Q4 | 51.2% | 85.2% | 67.4% | 45.8% | 56.4% | 50.7% |
| QLFS2009Q1 | 51.5% | 85.7% | 65.4% | 45.6% | 56.9% | 51.2% |
| QLFS2009Q2 | 50.2% | 84.9% | 65.8% | 44.0% | 56.2% | 50.0% |
| QLFS2009Q3 | 48.0% | 83.5% | 60.0% | 42.8% | 55.3% | 48.2% |
| QLFS2009Q4 | 48.8% | 83.7% | 64.2% | 43.1% | 53.8% | 49.0% |

Source: Own calculations using OHS, LFS and QLFS data.

In conclusion, using all the available OHSs, LFSs, and the QLFSs between 1995 and 2009, the results of the analyses indicate that feminization of the LF did not take place since the transition. This was evidenced by the fact that the male share of LF and male LFPR were greater during the period under study, regardless of race, age and province of residence. However, the female LF were more educated on average.

## 3.4 Characteristics of the employed

### 3.4.1 Employment trends

Table 9 and Figure 5 present information on employment by gender. Employment fluctuated a lot throughout the years. For example, there was an over-estimation of the number of employed in the OHS1995 compared to OHS1996-1998. This was due to the over-estimation of the size of the male agricultural workers. In addition, there was an abrupt increase of close 1.1 million employees in the OHS1999. This increase was a result of rapid growth of informal sector employment and was driven by both genders. The change from the OHS to the LFS saw a further 1.5 million (0.3 million increase in male but 1.2 million in increase in female) increase in the number of employed. Employment also abruptly decreased between LFS2001a and LFS2001b, and this was mainly due to large decreases recorded by females.

Table 9: Employment by gender, 1995-2009

| | Number of employed (1000s) | | | % share of employment | | |
|---|---|---|---|---|---|---|
| | **Male** | **Female** | **Total** | **Male** | **Female** | **Total** |
| OHS1995 | 5,789 | 3,710 | 9,499 | 60.9% | 39.1% | 100% |
| OHS1996 | 5,327 | 3,639 | 8,966 | 59.4% | 40.6% | 100% |
| OHS1997 | 5,538 | 3,554 | 9,092 | 60.9% | 39.1% | 100% |
| OHS1998 | 5,634 | 3,735 | 9,369 | 60.1% | 39.9% | 100% |
| OHS1999 | 6,001 | 4,347 | 10,348 | 58.0% | 42.0% | 100% |
| LFS2000a | 6,295 | 5,574 | 11,869 | 53.0% | 47.0% | 100% |
| LFS2000b | 6,935 | 5,288 | 12,223 | 56.7% | 43.3% | 100% |
| LFS2001a | 6,779 | 5,478 | 12,257 | 55.3% | 44.7% | 100% |
| LFS2001b | 6,434 | 4,732 | 11,166 | 57.6% | 42.4% | 100% |
| LFS2002a | 6,598 | 5,004 | 11,602 | 56.9% | 43.1% | 100% |
| LFS2002b | 6,607 | 4,672 | 11,279 | 58.6% | 41.4% | 100% |
| LFS2003a | 6,517 | 4,778 | 11,295 | 57.7% | 42.3% | 100% |
| LFS2003b | 6,606 | 4,804 | 11,410 | 57.9% | 42.1% | 100% |
| LFS2004a | 6,631 | 4,746 | 11,377 | 58.3% | 41.7% | 100% |
| LFS2004b | 6,764 | 4,860 | 11,624 | 58.2% | 41.8% | 100% |
| LFS2005a | 6,904 | 4,984 | 11,888 | 58.1% | 41.9% | 100% |
| LFS2005b | 7,047 | 5,235 | 12,282 | 57.4% | 42.6% | 100% |
| LFS2006a | 7,103 | 5,333 | 12,436 | 57.1% | 42.9% | 100% |
| LFS2006b | 7,312 | 5,474 | 12,786 | 57.2% | 42.8% | 100% |
| LFS2007a | 7,263 | 5,371 | 12,634 | 57.5% | 42.5% | 100% |
| LFS2007b | 7,517 | 5,767 | 13,284 | 56.6% | 43.4% | 100% |
| QLFS2008Q1 | 7,639 | 5,997 | 13,636 | 56.0% | 44.0% | 100% |
| QLFS2008Q2 | 7,709 | 6,039 | 13,748 | 56.1% | 43.9% | 100% |
| QLFS2008Q3 | 7,633 | 6,035 | 13,668 | 55.8% | 44.2% | 100% |
| QLFS2008Q4 | 7,757 | 6,104 | 13,861 | 56.0% | 44.0% | 100% |
| QLFS2009Q1 | 7,583 | 6,068 | 13,651 | 55.5% | 44.5% | 100% |
| QLFS2009Q2 | 7,407 | 5,980 | 13,387 | 55.3% | 44.7% | 100% |
| QLFS2009Q3 | 7,108 | 5,788 | 12,896 | 55.1% | 44.9% | 100% |
| QLFS2009Q4 | 7,193 | 5,790 | 12,983 | 55.4% | 44.6% | 100% |

Source: Own calculations using OHS, LFS and QLFS data.

Figure 5: Shares of the employed by gender, 1995-2009
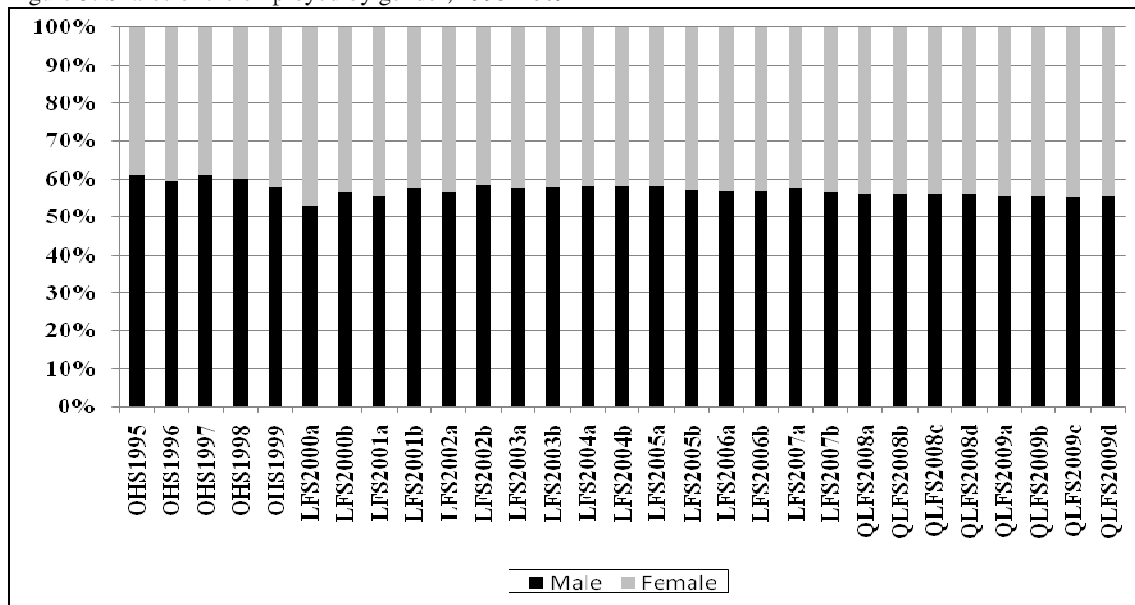


Source: Own calculations using OHS, LFS and QLFS data.

Since LFS2002a, there was a steady upward trend in the number of employed as well as shares of employed, but the male shares of the employed remains more dominant (Figure 5). Finally, the number of employed decreased by close to 1 million between the QLFS2008Q4 and the QLFS2009Q3, due to the global financial crisis. All these findings discussed above suggest that feminization of employment did not take place since the transition.

Table 10 presents the TGRs, AGRs, and EARs by gender in 1995-1999, 1999-2004, 2004-2009 and 1995-2009. It can be seen that in the earlier periods, EAR was less than 100% in both genders, implying that the jobs created were insufficient to absorb all the net labour force entrants. This explains why jobless growth under the second definition did not take place until the middle of 2000s, as found by resent studies (see Chapter 2). However, when comparing the LFS2004b with QLFS2009Q4, the EAR was much higher in both genders (in fact, it exceeds 100% in the case of females). When looking at the whole 15-year period, the female EAR was greater (69.2% versus 53.8% in the case of males). However, this must be interpreted with caution, since the higher EAR in the females was driven by the fact that male employment was over-estimated in OHS1995.

Table 10: Employment Performance of the economy by gender, 1995-2009

|  | TGR | | AGR | | EAR | |
|---|---|---|---|---|---|---|
|  | **Male** | **Female** | **Male** | **Female** | **Male** | **Female** |
| **OHS1995 vs. OHS1999** | 13.2% | 32.6% | 3.7% | 17.2% | 27.7% | 52.8% |
| **OHS1999 vs. LFS2004b** | 21.9% | 21.6% | 12.7% | 11.8% | 58.2% | 54.6% |
| **LFS2004b vs. QLFS2009Q4** | 7.9% | 17.7% | 6.3% | 19.1% | 80.5% | 108.0% |
| **OHS1995 vs. QLFS2009Q4** | 45.1% | 81.1% | 24.3% | 56.1% | 53.8% | 69.2% |

Source: Own calculations using OHS1995, OHS1999, LFS2004b and QLFS2009Q4 data.

3.4.2 Demographic characteristics of the employed

Table 11 shows the racial shares of employed, and it can be seen that the African share increased in both genders (from slightly above 60% in the OHSs to nearly 70% in recent surveys) at the cost of the White shares.

Table 11: Racial share of employed in each gender, 1995-2009

|  | Male | | | | Female | | | |
|---|---|---|---|---|---|---|---|---|
|  | **African** | **Coloured** | **Indian** | **White** | **African** | **Coloured** | **Indian** | **White** |
| OHS1995 | 65.3% | 11.4% | 4.2% | 19.1% | 63.5% | 13.1% | 3.2% | 20.3% |
| OHS1996 | 61.9% | 13.0% | 4.1% | 21.0% | 60.2% | 14.5% | 3.3% | 22.0% |
| OHS1997 | 63.7% | 12.2% | 4.2% | 20.0% | 61.6% | 13.7% | 3.6% | 21.2% |
| OHS1998 | 64.2% | 11.9% | 4.0% | 19.7% | 61.5% | 13.4% | 3.1% | 22.0% |
| OHS1999 | 65.3% | 11.9% | 4.0% | 18.6% | 63.1% | 13.0% | 3.5% | 20.2% |

Table 11: Continued

| | Male | | | | Female | | | |
|---|---|---|---|---|---|---|---|---|
| | African | Coloured | Indian | White | African | Coloured | Indian | White |
| LFS2000a | 66.9% | 10.9% | 3.9% | 18.2% | 70.1% | 11.3% | 2.6% | 15.9% |
| LFS2000b | 67.8% | 10.6% | 3.8% | 17.5% | 69.3% | 11.2% | 2.7% | 16.6% |
| LFS2001a | 67.8% | 10.5% | 3.8% | 17.6% | 70.5% | 11.1% | 2.8% | 15.6% |
| LFS2001b | 66.0% | 10.9% | 4.2% | 18.8% | 65.4% | 12.2% | 3.4% | 18.8% |
| LFS2002a | 66.6% | 10.9% | 3.8% | 18.5% | 67.6% | 11.8% | 3.1% | 17.4% |
| LFS2002b | 66.5% | 11.1% | 4.0% | 18.3% | 66.6% | 12.0% | 3.4% | 17.9% |
| LFS2003a | 66.7% | 11.0% | 4.0% | 18.2% | 65.9% | 13.0% | 3.1% | 17.9% |
| LFS2003b | 66.9% | 10.8% | 4.1% | 18.1% | 65.5% | 12.4% | 3.3% | 18.6% |
| LFS2004a | 66.7% | 11.3% | 4.2% | 17.7% | 65.7% | 13.4% | 3.0% | 17.9% |
| LFS2004b | 68.1% | 10.3% | 4.1% | 17.1% | 67.0% | 12.3% | 2.9% | 17.6% |
| LFS2005a | 68.4% | 10.7% | 4.0% | 16.7% | 67.3% | 12.4% | 2.9% | 17.3% |
| LFS2005b | 69.3% | 10.5% | 4.0% | 15.9% | 68.9% | 11.2% | 3.1% | 16.5% |
| LFS2006a | 69.0% | 10.6% | 3.8% | 16.4% | 68.8% | 11.8% | 3.0% | 16.3% |
| LFS2006b | 69.7% | 10.5% | 3.9% | 15.6% | 69.0% | 11.7% | 3.1% | 15.9% |
| LFS2007a | 70.9% | 10.3% | 3.7% | 15.1% | 69.1% | 12.1% | 2.7% | 16.1% |
| LFS2007b | 70.9% | 9.5% | 4.4% | 15.2% | 69.9% | 11.4% | 2.4% | 16.3% |
| QLFS2008Q1 | 69.5% | 11.3% | 3.8% | 15.5% | 70.1% | 11.6% | 2.9% | 15.4% |
| QLFS2008Q2 | 70.0% | 11.2% | 3.7% | 15.1% | 70.8% | 11.2% | 2.9% | 15.0% |
| QLFS2008Q3 | 69.6% | 11.1% | 4.0% | 15.3% | 70.6% | 11.5% | 2.9% | 14.9% |
| QLFS2008Q4 | 70.2% | 11.1% | 3.7% | 15.0% | 70.4% | 11.6% | 2.9% | 15.0% |
| QLFS2009Q1 | 69.6% | 11.1% | 3.9% | 15.4% | 69.8% | 12.3% | 2.8% | 15.1% |
| QLFS2009Q2 | 69.0% | 11.5% | 4.0% | 15.5% | 70.0% | 11.9% | 2.8% | 15.3% |
| QLFS2009Q3 | 68.8% | 11.6% | 4.1% | 15.5% | 70.0% | 11.9% | 2.8% | 15.4% |
| QLFS2009Q4 | 68.5% | 11.8% | 4.0% | 15.8% | 69.8% | 12.0% | 2.8% | 15.3% |

Source: Own calculations using OHS, LFS and QLFS data.

Table 12 presents the age category of the employed in each gender. Most of the employed were aged between 25 and 44 years. With regard to the gender share of employed in each age category, the 15-24 age categories were dominated by men. This means that there were more young females still studying than men, because most of the men in the school-going age were employed. The older age groups (i.e. 45-54 years old and the 55-65 years) of the employed were dominated by males and females respectively. This implies that women tend to exit the labour market earlier than their male counterparts.

Table 12: Age category share of employed in each gender, 1995-2009

| | Male | | | | | Female | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | 15-24 years | 25-34 years | 35-44 years | 45-54 years | 55-65 years | 15-24 years | 25-34 years | 35-44 years | 45-54 years | 55-65 years |
| OHS1995 | 11.3% | 34.1% | 30.1% | 17.2% | 7.3% | 12.7% | 35.0% | 30.1% | 15.9% | 6.3% |
| OHS1996 | 11.7% | 33.2% | 30.1% | 17.2% | 7.7% | 13.0% | 33.4% | 31.2% | 16.2% | 6.2% |
| OHS1997 | 10.4% | 33.6% | 30.4% | 18.1% | 7.5% | 11.7% | 33.6% | 31.6% | 17.1% | 6.0% |
| OHS1998 | 11.3% | 34.1% | 30.2% | 17.3% | 7.1% | 12.3% | 33.9% | 30.9% | 16.6% | 6.3% |
| OHS1999 | 12.0% | 33.9% | 29.8% | 17.1% | 7.2% | 13.4% | 33.8% | 29.6% | 16.6% | 6.7% |
| LFS2000a | 15.7% | 31.4% | 27.6% | 16.9% | 8.4% | 13.9% | 31.1% | 29.3% | 16.4% | 9.2% |
| LFS2000b | 13.3% | 32.6% | 26.7% | 18.0% | 9.4% | 12.1% | 30.8% | 28.4% | 19.6% | 9.0% |
| LFS2001a | 12.5% | 33.0% | 27.1% | 18.1% | 9.3% | 12.2% | 30.7% | 28.7% | 19.2% | 9.3% |
| LFS2001b | 11.9% | 33.0% | 27.9% | 18.5% | 8.8% | 11.6% | 32.2% | 29.3% | 19.1% | 7.7% |

Table 12: Continued

|  | Male | | | | | Female | | | | |
|  | 15-24 years | 25-34 years | 35-44 years | 45-54 years | 55-65 years | 15-24 years | 25-34 years | 35-44 years | 45-54 years | 55-65 years |
|---|---|---|---|---|---|---|---|---|---|---|
| LFS2002a | 12.1% | 33.4% | 27.3% | 18.2% | 8.9% | 12.3% | 30.9% | 28.8% | 19.4% | 8.6% |
| LFS2002b | 11.8% | 34.4% | 27.3% | 17.8% | 8.6% | 10.8% | 31.9% | 29.2% | 19.8% | 8.3% |
| LFS2003a | 10.8% | 34.6% | 27.5% | 18.5% | 8.6% | 10.3% | 32.4% | 29.4% | 19.8% | 8.1% |
| LFS2003b | 10.6% | 35.5% | 27.1% | 18.3% | 8.5% | 11.0% | 32.6% | 28.3% | 20.3% | 7.9% |
| LFS2004a | 10.7% | 34.8% | 27.3% | 18.5% | 8.7% | 10.5% | 33.2% | 28.0% | 19.8% | 8.4% |
| LFS2004b | 11.8% | 35.3% | 25.7% | 18.4% | 8.8% | 10.1% | 32.0% | 28.6% | 21.0% | 8.3% |
| LFS2005a | 11.0% | 34.5% | 26.5% | 18.2% | 9.8% | 10.2% | 32.4% | 27.9% | 20.9% | 8.6% |
| LFS2005b | 12.0% | 34.7% | 25.9% | 18.0% | 9.4% | 10.8% | 32.6% | 27.1% | 21.1% | 8.4% |
| LFS2006a | 11.8% | 34.9% | 25.6% | 18.3% | 9.4% | 10.9% | 32.9% | 26.3% | 20.8% | 9.1% |
| LFS2006b | 11.9% | 34.6% | 26.1% | 18.3% | 9.1% | 10.7% | 33.3% | 26.2% | 20.8% | 9.0% |
| LFS2007a | 12.2% | 35.0% | 25.8% | 18.0% | 8.9% | 9.8% | 33.5% | 27.2% | 20.3% | 9.2% |
| LFS2007b | 11.8% | 35.4% | 25.8% | 17.5% | 9.4% | 10.9% | 32.7% | 27.6% | 20.8% | 8.0% |
| QLFS2008Q1 | 12.6% | 35.3% | 25.5% | 17.8% | 8.7% | 11.5% | 32.4% | 27.5% | 20.4% | 8.2% |
| QLFS2008Q2 | 12.8% | 34.9% | 25.6% | 18.1% | 8.6% | 11.8% | 32.4% | 27.2% | 20.1% | 8.4% |
| QLFS2008Q3 | 12.4% | 35.0% | 25.5% | 18.3% | 8.8% | 10.8% | 32.9% | 27.6% | 20.4% | 8.2% |
| QLFS2008Q4 | 12.4% | 35.5% | 25.4% | 17.8% | 8.8% | 10.7% | 32.3% | 28.3% | 20.6% | 8.1% |
| QLFS2009Q1 | 12.2% | 34.6% | 26.0% | 18.1% | 9.1% | 10.3% | 31.8% | 28.4% | 21.2% | 8.3% |
| QLFS2009Q2 | 11.7% | 34.6% | 26.2% | 18.4% | 9.0% | 10.3% | 31.9% | 28.9% | 20.4% | 8.4% |
| QLFS2009Q3 | 11.2% | 34.8% | 26.6% | 18.4% | 9.0% | 9.9% | 31.9% | 29.4% | 20.6% | 8.1% |
| QLFS2009Q4 | 11.4% | 34.5% | 26.3% | 18.9% | 8.9% | 9.9% | 32.1% | 29.4% | 20.4% | 8.2% |

Source: Own calculations using OHS, LFS and QLFS data.

Table 13 present male shares of employment by educational attainment. During the OHS years, about 8% of men with no education were employed. However, as years went by, the employment shares of men with no school declined to 3.3% at the end of 2009. Table 13 also shows that the bulk of the employed men with at least Matric increased. Two conclusions can be drawn: first, the male employed were more educated on average; secondly, the labour market preferred more educated workers. Similar findings were observed when looking at the educational attainment of the female employed (See Table 14).

Table 13: Proportion of male employed in each educational attainment category, 1995-2009

|  | No schooling | Incomplete primary | Incomplete secondary | Matric | Matric + Cert/Dip | Degree | Unspecified |  |
|---|---|---|---|---|---|---|---|---|
| OHS1995 | 8.3% | 17.0% | 39.4% | 21.8% | 7.9% | 4.9% | 0.7% | 100.0% |
| OHS1996 | 8.4% | 15.0% | 39.3% | 23.8% | 6.8% | 5.8% | 1.0% | 100.0% |
| OHS1997 | 8.6% | 15.0% | 40.4% | 22.3% | 8.5% | 4.9% | 0.3% | 100.0% |
| OHS1998 | 9.1% | 16.7% | 38.4% | 23.0% | 8.2% | 4.5% | 0.2% | 100.0% |
| OHS1999 | 7.4% | 17.3% | 37.2% | 23.1% | 5.6% | 6.7% | 2.6% | 100.0% |
| LFS2000a | 7.5% | 18.1% | 40.1% | 20.9% | 6.6% | 5.3% | 1.6% | 100.0% |
| LFS2000b | 7.5% | 18.5% | 38.5% | 20.5% | 6.9% | 6.8% | 1.3% | 100.0% |
| LFS2001a | 7.5% | 17.4% | 38.9% | 22.0% | 6.8% | 6.2% | 1.2% | 100.0% |
| LFS2001b | 6.8% | 17.4% | 37.2% | 24.2% | 6.7% | 6.4% | 1.3% | 100.0% |
| LFS2002a | 7.2% | 16.8% | 37.2% | 23.8% | 6.8% | 7.0% | 1.2% | 100.0% |
| LFS2002b | 6.7% | 15.7% | 37.7% | 24.7% | 6.9% | 7.1% | 1.2% | 100.0% |
| LFS2003a | 6.2% | 16.6% | 37.5% | 24.4% | 7.4% | 7.0% | 0.9% | 100.0% |
| LFS2003b | 5.7% | 14.8% | 37.4% | 27.3% | 7.1% | 7.0% | 0.7% | 100.0% |

Table 13: Continued

|  | No schooling | Incomplete primary | Incomplete secondary | Matric | Matric + Cert/Dip | Degree | Un-specified | |
|---|---|---|---|---|---|---|---|---|
| LFS2004a | 5.7% | 15.4% | 37.7% | 27.3% | 7.0% | 6.5% | 0.5% | 100.0% |
| LFS2004b | 6.1% | 14.0% | 37.6% | 27.5% | 7.0% | 6.4% | 1.3% | 100.0% |
| LFS2005a | 5.2% | 14.2% | 38.0% | 28.0% | 7.2% | 6.6% | 0.9% | 100.0% |
| LFS2005b | 5.3% | 13.6% | 39.4% | 27.1% | 7.7% | 6.1% | 0.8% | 100.0% |
| LFS2006a | 4.7% | 13.3% | 39.0% | 28.3% | 7.8% | 6.3% | 0.5% | 100.0% |
| LFS2006b | 4.5% | 12.7% | 39.5% | 28.2% | 8.5% | 5.9% | 0.7% | 100.0% |
| LFS2007a | 4.7% | 12.4% | 39.9% | 28.4% | 8.2% | 5.8% | 0.6% | 100.0% |
| LFS2007b | 5.1% | 12.4% | 38.4% | 26.7% | 9.0% | 7.4% | 1.0% | 100.0% |
| QLFS2008Q1 | 3.9% | 11.6% | 39.6% | 28.7% | 8.8% | 6.0% | 1.5% | 100.0% |
| QLFS2008Q2 | 4.2% | 11.4% | 39.4% | 28.1% | 9.0% | 6.3% | 1.7% | 100.0% |
| QLFS2008Q3 | 4.0% | 11.1% | 39.9% | 28.3% | 8.9% | 6.5% | 1.5% | 100.0% |
| QLFS2008Q4 | 3.9% | 10.5% | 40.3% | 27.8% | 9.7% | 6.2% | 1.5% | 100.0% |
| QLFS2009Q1 | 3.7% | 10.7% | 39.9% | 28.0% | 10.0% | 6.4% | 1.3% | 100.0% |
| QLFS2009Q2 | 3.5% | 10.0% | 40.0% | 28.8% | 10.1% | 6.5% | 1.2% | 100.0% |
| QLFS2009Q3 | 3.2% | 9.5% | 38.8% | 29.6% | 10.4% | 6.8% | 1.6% | 100.0% |
| QLFS2009Q4 | 3.3% | 9.4% | 38.8% | 30.5% | 9.8% | 6.7% | 1.5% | 100.0% |

Source: Own calculations using OHS, LFS and QLFS data.

Table 14: Proportion of female employed in each educational attainment category, 1995-2009

|  | No schooling | Incomplete primary | Incomplete secondary | Matric | Matric + Cert/Dip | Degree | Un-specified | |
|---|---|---|---|---|---|---|---|---|
| OHS1995 | 7.8% | 15.0% | 37.8% | 22.5% | 11.6% | 4.3% | 1.1% | 100.0% |
| OHS1996 | 7.3% | 13.9% | 36.9% | 24.1% | 11.4% | 5.4% | 1.0% | 100.0% |
| OHS1997 | 7.8% | 12.5% | 39.3% | 24.7% | 10.5% | 4.8% | 0.4% | 100.0% |
| OHS1998 | 8.8% | 14.7% | 35.1% | 25.3% | 10.9% | 4.7% | 0.4% | 100.0% |
| OHS1999 | 7.4% | 15.8% | 35.7% | 23.3% | 9.4% | 6.3% | 2.1% | 100.0% |
| LFS2000a | 9.9% | 18.9% | 37.9% | 19.7% | 7.5% | 4.8% | 1.2% | 100.0% |
| LFS2000b | 9.0% | 17.6% | 37.8% | 18.3% | 9.3% | 7.1% | 0.9% | 100.0% |
| LFS2001a | 9.0% | 17.2% | 37.6% | 20.5% | 9.1% | 5.8% | 0.8% | 100.0% |
| LFS2001b | 7.3% | 15.4% | 36.4% | 23.3% | 9.6% | 7.0% | 1.1% | 100.0% |
| LFS2002a | 8.7% | 15.6% | 37.0% | 22.5% | 9.4% | 6.0% | 0.8% | 100.0% |
| LFS2002b | 7.6% | 14.8% | 35.8% | 23.6% | 10.4% | 6.8% | 0.9% | 100.0% |
| LFS2003a | 7.1% | 14.7% | 36.3% | 23.8% | 10.2% | 7.0% | 0.9% | 100.0% |
| LFS2003b | 6.1% | 14.1% | 34.9% | 26.1% | 11.4% | 6.9% | 0.5% | 100.0% |
| LFS2004a | 6.8% | 13.5% | 35.0% | 25.8% | 10.9% | 7.6% | 0.4% | 100.0% |
| LFS2004b | 6.3% | 12.6% | 36.6% | 26.2% | 10.8% | 6.6% | 0.9% | 100.0% |
| LFS2005a | 5.7% | 12.6% | 36.9% | 26.3% | 10.7% | 7.1% | 0.5% | 100.0% |
| LFS2005b | 6.4% | 11.8% | 36.7% | 27.4% | 10.3% | 6.8% | 0.7% | 100.0% |
| LFS2006a | 6.0% | 12.8% | 36.2% | 27.4% | 10.9% | 6.5% | 0.3% | 100.0% |
| LFS2006b | 6.1% | 11.8% | 37.4% | 27.1% | 11.0% | 6.0% | 0.5% | 100.0% |
| LFS2007a | 5.4% | 11.7% | 37.3% | 27.1% | 11.6% | 6.5% | 0.4% | 100.0% |
| LFS2007b | 5.3% | 11.1% | 36.0% | 27.2% | 11.4% | 8.6% | 0.5% | 100.0% |
| QLFS2008Q1 | 4.6% | 9.9% | 37.0% | 28.3% | 12.7% | 6.6% | 0.8% | 100.0% |
| QLFS2008Q2 | 4.4% | 9.8% | 37.0% | 29.2% | 12.0% | 6.8% | 0.8% | 100.0% |
| QLFS2008Q3 | 4.6% | 9.9% | 36.0% | 29.2% | 12.5% | 7.0% | 0.8% | 100.0% |
| QLFS2008Q4 | 4.3% | 9.6% | 37.1% | 28.5% | 12.7% | 7.1% | 0.8% | 100.0% |
| QLFS2009Q1 | 4.2% | 9.7% | 36.0% | 28.9% | 13.3% | 7.3% | 0.6% | 100.0% |
| QLFS2009Q2 | 3.9% | 8.7% | 36.8% | 29.0% | 13.6% | 7.2% | 0.7% | 100.0% |
| QLFS2009Q3 | 4.0% | 8.4% | 35.8% | 29.6% | 14.0% | 7.3% | 0.9% | 100.0% |
| QLFS2009Q4 | 3.5% | 8.6% | 36.4% | 30.0% | 13.5% | 7.2% | 0.7% | 100.0% |

Source: Own calculations using OHS, LFS and QLFS data.

Figure 6 provides more information by showing the mean years of the employed between 1995 and 2009 in each gender. The figure clearly shows that employed females were clearly more educated than men in all OHSs and QLFSs.

Figure 6: Mean years of education of the employed by gender, 1995-2009
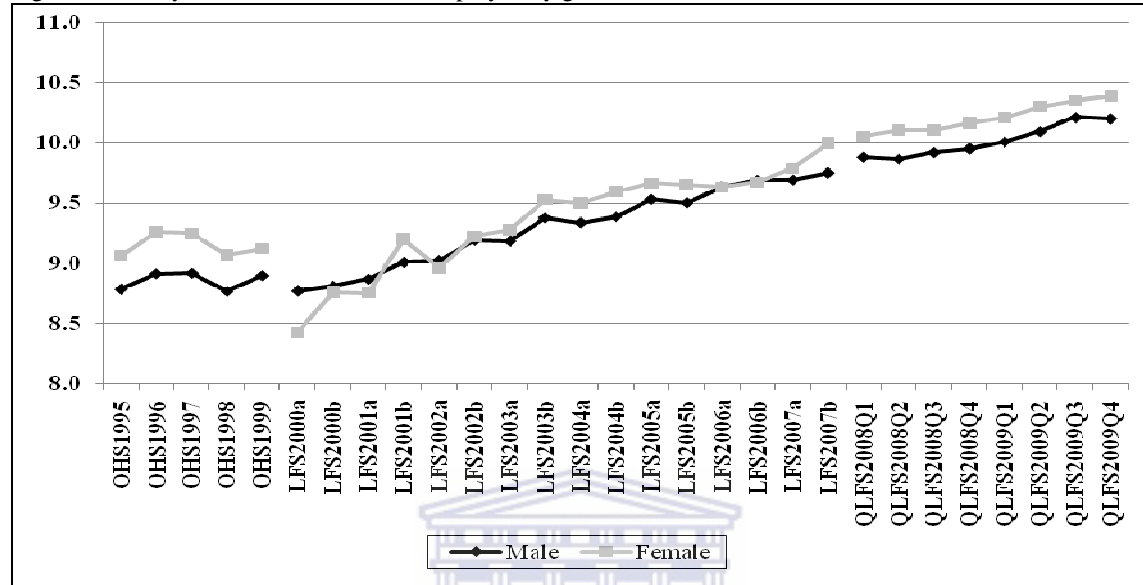


Source: Own calculations using OHS, LFS and QLFS data.

The provincial shares of employment by gender did not show any significant change since the transition, so Figure 7 only presents the QLFS2009Q4 results. Both genders were highly represented in the more developed provinces with possibly greater employment opportunities, namely Gauteng, KwaZulu-Natal and Western Cape.

Figure 7: Provincial shares of employment by gender, QLFS2009Q4
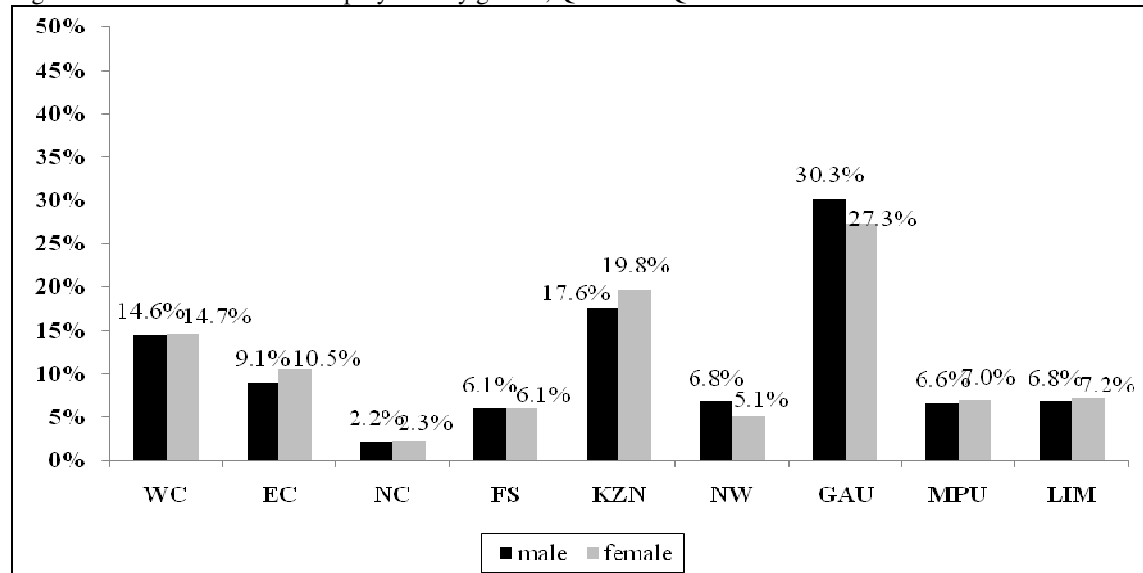


Source: Own calculations using QLFS2009Q4 data.

### 3.4.3 Work activities of the employed

As far as work activities of the employed are concerned, during the period under investigation, Figure 8 presents shares of the self-employed by gender. In general, the OHSs poorly captured the self-employed. This is evidenced by the 24.4% of self-employed women recorded OHS1995, compared to only 8.1% recorded by their male counterparts during the same period. The OHS1996 recorded an all-time low of 5.7% of the self-employed females. The later years of the survey witnessed an upward trend. Shares of the self-employed for both genders were much higher (29.8% for females and 22.4% for males) during the changeover from the OHS to the LFS. The period between the OHS1999 and the LFS2001a recorded higher self-employed figures due to the over-estimation of the agricultural and informal sector workers. The trend continued to show an over-representation of women during the LFS years[20]. They recorded average shares 22.8% compared to 18.6% witnessed by men. The later QLFS years shows that there were more self-employed men than females, as the self-employment share of males reached 15.8%, which 0.6 percentage points higher than that of the females.

Figure 8: Share of the self-employed by gender, 1995-2009
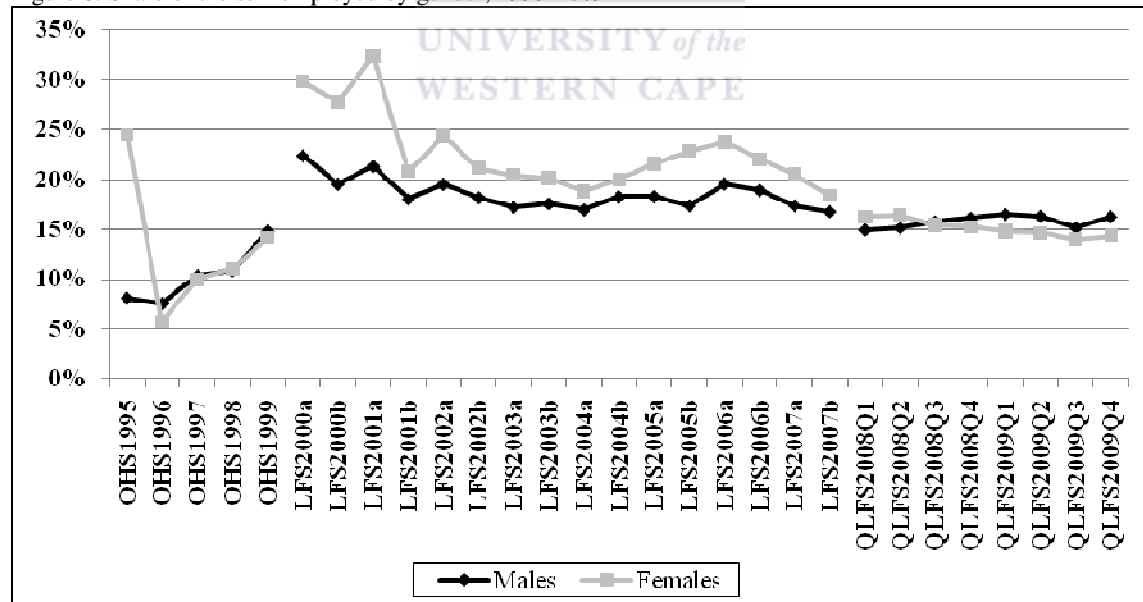


Source: Own calculations using OHS, LFS and QLFS data.

The shares of employed in each sector are presented in Tables 15 and 16[21]. Nearly three

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[20] The self-employed share stabilized. It was captured better in the LFSs/QLFSs due to an improvement of questionnaire as explained by Table 2.
[21] Tables 15 and 16 show the sectoral shares since OHS1997 since the employees were not asked to declare formal/informal sector status in OHS1995-1996.

quarters of male employed were involved in formal non-agricultural activities in recent surveys, while this share was only about 65% in the females. In fact, a higher proportion of females worked as domestic workers (approximately 15% in 2009, compared with only 3.5% in males).

Table 15: Male shares of employed in each sector, 1995-2009

|  | [A] | [B] | [C] | [D] | [E] | [F] | [G] |  |
|---|---|---|---|---|---|---|---|---|
| OHS1997 | 1.9% | 12.0% | 76.0% | 2.4% | 6.9% | 0.0% | 0.8% | 100.0% |
| OHS1998 | 1.8% | 11.0% | 74.0% | 2.5% | 9.4% | 0.0% | 1.2% | 100.0% |
| OHS1999 | 0.7% | 15.6% | 70.9% | 2.7% | 9.2% | 0.0% | 1.0% | 100.0% |
| LFS2000a | 0.7% | 15.5% | 64.9% | 9.7% | 8.0% | 0.9% | 0.2% | 100.0% |
| LFS2000b | 0.6% | 16.7% | 64.9% | 6.9% | 7.9% | 1.1% | 1.9% | 100.0% |
| LFS2001a | 0.6% | 20.4% | 62.9% | 5.1% | 8.3% | 2.3% | 0.3% | 100.0% |
| LFS2001b | 0.4% | 17.0% | 68.3% | 3.9% | 8.7% | 1.3% | 0.3% | 100.0% |
| LFS2002a | 0.5% | 15.7% | 67.3% | 6.3% | 9.3% | 0.8% | 0.1% | 100.0% |
| LFS2002b | 0.6% | 15.6% | 68.8% | 4.6% | 9.4% | 0.7% | 0.3% | 100.0% |
| LFS2003a | 0.8% | 15.9% | 69.5% | 3.9% | 9.1% | 0.6% | 0.1% | 100.0% |
| LFS2003b | 0.7% | 16.4% | 69.7% | 3.5% | 9.2% | 0.3% | 0.2% | 100.0% |
| LFS2004a | 0.6% | 15.7% | 70.6% | 3.1% | 9.6% | 0.3% | 0.1% | 100.0% |
| LFS2004b | 0.6% | 17.5% | 71.0% | 3.7% | 6.6% | 0.5% | 0.1% | 100.0% |
| LFS2005a | 0.7% | 17.5% | 70.7% | 4.0% | 6.5% | 0.2% | 0.3% | 100.0% |
| LFS2005b | 0.4% | 19.6% | 70.7% | 2.7% | 5.8% | 0.3% | 0.4% | 100.0% |
| LFS2006a | 0.1% | 18.2% | 70.7% | 4.8% | 5.9% | 0.1% | 0.2% | 100.0% |
| LFS2006b | 0.2% | 19.4% | 70.8% | 3.3% | 5.6% | 0.4% | 0.2% | 100.0% |
| LFS2007a | 0.9% | 16.9% | 72.2% | 3.3% | 5.8% | 0.5% | 0.3% | 100.0% |
| LFS2007b | 1.3% | 16.2% | 72.6% | 2.9% | 6.2% | 0.5% | 0.4% | 100.0% |
| QLFS2008Q1 | 3.3% | 16.2% | 73.8% | 1.6% | 5.2% | 0.0% | 0.0% | 100.0% |
| QLFS2008Q2 | 3.3% | 16.4% | 73.3% | 1.3% | 5.7% | 0.0% | 0.0% | 100.0% |
| QLFS2008Q3 | 3.5% | 15.5% | 74.3% | 1.1% | 5.6% | 0.0% | 0.0% | 100.0% |
| QLFS2008Q4 | 3.5% | 16.1% | 73.7% | 1.2% | 5.6% | 0.0% | 0.0% | 100.0% |
| QLFS2009Q1 | 3.6% | 15.4% | 74.4% | 1.3% | 5.3% | 0.0% | 0.0% | 100.0% |
| QLFS2009Q2 | 3.3% | 15.5% | 74.6% | 1.0% | 5.7% | 0.0% | 0.0% | 100.0% |
| QLFS2009Q3 | 3.5% | 15.2% | 75.3% | 0.8% | 5.2% | 0.0% | 0.0% | 100.0% |
| QLFS2009Q4 | 3.4% | 16.2% | 74.7% | 1.1% | 4.5% | 0.0% | 0.0% | 100.0% |

Source: Own calculations using OHS, LFS and QLFS data.
[A]: Domestic workers
[B]: Informal sector (excluding agriculture)
[C]: Formal sector (excluding agriculture)
[D]: Subsistence Agriculture
[E]: Commercial Agriculture
[F]: Don't Know
[G]: Unspecified

Table 16: Female shares of employed in each sector, 1995-2009

|  | [A] | [B] | [C] | [D] | [E] | [F] | [G] | Total |
|---|---|---|---|---|---|---|---|---|
| OHS1997 | 20.3% | 10.6% | 62.7% | 1.6% | 4.0% | 0.0% | 0.8% | 100.0% |
| OHS1998 | 17.3% | 12.2% | 62.5% | 1.7% | 5.2% | 0.0% | 1.1% | 100.0% |
| OHS1999 | 17.8% | 14.6% | 58.4% | 2.9% | 5.6% | 0.0% | 0.8% | 100.0% |
| LFS2000a | 17.1% | 15.2% | 46.3% | 16.1% | 4.5% | 0.6% | 0.2% | 100.0% |
| LFS2000b | 17.0% | 16.5% | 48.7% | 11.3% | 4.2% | 0.6% | 1.9% | 100.0% |
| LFS2001a | 14.6% | 26.5% | 46.2% | 7.2% | 4.1% | 1.1% | 0.3% | 100.0% |
| LFS2001b | 18.0% | 18.3% | 55.5% | 2.8% | 4.3% | 0.9% | 0.2% | 100.0% |
| LFS2002a | 16.8% | 15.7% | 52.9% | 8.9% | 5.0% | 0.5% | 0.1% | 100.0% |
| LFS2002b | 17.2% | 16.1% | 56.1% | 5.2% | 4.9% | 0.4% | 0.2% | 100.0% |
| LFS2003a | 17.4% | 16.5% | 56.3% | 3.9% | 5.2% | 0.4% | 0.2% | 100.0% |
| LFS2003b | 17.6% | 17.1% | 57.4% | 2.8% | 4.7% | 0.3% | 0.2% | 100.0% |
| LFS2004a | 17.0% | 15.3% | 58.8% | 2.9% | 5.8% | 0.1% | 0.1% | 100.0% |
| LFS2004b | 17.3% | 15.6% | 59.2% | 3.7% | 3.7% | 0.5% | 0.2% | 100.0% |
| LFS2005a | 16.1% | 17.2% | 57.3% | 4.7% | 4.0% | 0.2% | 0.5% | 100.0% |
| LFS2005b | 15.8% | 20.6% | 57.1% | 2.8% | 3.2% | 0.2% | 0.2% | 100.0% |
| LFS2006a | 15.8% | 16.8% | 56.8% | 6.8% | 3.5% | 0.1% | 0.2% | 100.0% |
| LFS2006b | 15.9% | 17.5% | 58.4% | 4.2% | 3.5% | 0.3% | 0.2% | 100.0% |
| LFS2007a | 16.2% | 16.7% | 59.1% | 4.0% | 3.4% | 0.3% | 0.3% | 100.0% |
| LFS2007b | 16.1% | 15.0% | 61.9% | 2.7% | 3.5% | 0.2% | 0.6% | 100.0% |
| QLFS2008Q1 | 15.2% | 18.1% | 61.8% | 0.7% | 4.1% | 0.0% | 0.0% | 100.0% |
| QLFS2008Q2 | 15.4% | 18.0% | 62.4% | 0.4% | 3.8% | 0.0% | 0.0% | 100.0% |
| QLFS2008Q3 | 16.7% | 16.5% | 62.6% | 0.5% | 3.8% | 0.0% | 0.0% | 100.0% |
| QLFS2008Q4 | 16.9% | 16.4% | 62.8% | 0.4% | 3.5% | 0.0% | 0.0% | 100.0% |
| QLFS2009Q1 | 16.9% | 16.3% | 62.9% | 0.5% | 3.4% | 0.0% | 0.0% | 100.0% |
| QLFS2009Q2 | 15.9% | 16.2% | 64.3% | 0.4% | 3.2% | 0.0% | 0.0% | 100.0% |
| QLFS2009Q3 | 15.9% | 15.8% | 64.4% | 0.3% | 3.5% | 0.0% | 0.0% | 100.0% |
| QLFS2009Q4 | 15.4% | 16.3% | 64.7% | 0.4% | 3.2% | 0.0% | 0.0% | 100.0% |

Source: Own calculations using OHS, LFS and QLFS data.
[A]: Domestic workers
[B]: Informal sector (excluding agriculture)
[C]: Formal sector (excluding agriculture)
[D]: Subsistence Agriculture
[E]: Commercial Agriculture
[F]: Don't Know
[G]: Unspecified

A detailed investigation at the broad occupational category of the employed by gender (Tables 17 and 18) shows that during the period under study, there was a higher share of males employed in highly-skilled occupations (i.e. legislators, senior officials, managers, and professionals). The male dominance was also observed in semi-skilled employment. The transformation from the OHS to the LFS led to an over-estimation of skilled agricultural and fishery workers in both genders. However, there was a drastic decline for these workers during the QLFS, evidenced by average shares of 1% and 0.4% for males and females respectively. Lastly, a higher share of female was employed as domestic workers than men.

Table 17: Proportion of male employed in each broad occupation category, 1995-2009

|  | [A] | [B] | [C] | [D] | [E] | [F] | [G] | [H] | [I] | [J] | [K] |
|---|---|---|---|---|---|---|---|---|---|---|---|
| OHS1995 | 6.7% | 3.4% | 8.5% | 7.1% | 11.0% | 1.7% | 17.1% | 16.3% | 27.5% | 0.4% | 0.3% |
| OHS1996 | 5.9% | 3.9% | 10.7% | 6.1% | 11.9% | 3.9% | 18.0% | 13.0% | 18.4% | 1.8% | 6.5% |
| OHS1997 | 8.8% | 7.4% | 6.5% | 5.1% | 10.4% | 4.0% | 19.6% | 15.1% | 17.7% | 1.9% | 3.6% |
| OHS1998 | 9.9% | 5.0% | 7.2% | 5.6% | 11.9% | 3.1% | 20.0% | 14.7% | 17.8% | 1.8% | 2.9% |
| OHS1999 | 8.5% | 5.0% | 8.1% | 6.2% | 11.4% | 5.8% | 19.2% | 15.5% | 17.7% | 0.7% | 2.0% |
| LFS2000a | 7.3% | 3.8% | 7.5% | 5.0% | 11.6% | 12.5% | 19.4% | 15.2% | 16.5% | 0.7% | 0.4% |
| LFS2000b | 6.4% | 4.5% | 7.6% | 5.3% | 11.9% | 9.1% | 19.7% | 15.2% | 19.4% | 0.6% | 0.5% |
| LFS2001a | 7.4% | 3.6% | 8.5% | 4.8% | 12.7% | 8.2% | 19.1% | 14.8% | 19.6% | 0.6% | 0.5% |
| LFS2001b | 7.8% | 4.0% | 8.6% | 5.7% | 12.0% | 6.2% | 20.2% | 15.0% | 19.9% | 0.4% | 0.3% |
| LFS2002a | 8.0% | 4.2% | 9.0% | 5.3% | 10.9% | 9.4% | 18.5% | 14.9% | 18.7% | 0.5% | 0.4% |
| LFS2002b | 8.2% | 4.3% | 8.8% | 5.8% | 10.5% | 7.2% | 18.8% | 15.3% | 20.0% | 0.6% | 0.5% |
| LFS2003a | 8.3% | 4.7% | 8.2% | 5.7% | 10.9% | 3.7% | 18.5% | 15.7% | 23.1% | 0.8% | 0.5% |
| LFS2003b | 9.1% | 4.6% | 8.0% | 6.0% | 11.5% | 3.2% | 18.8% | 15.1% | 22.8% | 0.7% | 0.2% |
| LFS2004a | 9.3% | 4.2% | 8.3% | 5.5% | 11.7% | 2.9% | 18.5% | 15.3% | 23.4% | 0.6% | 0.2% |
| LFS2004b | 10.1% | 3.4% | 7.7% | 5.7% | 12.2% | 2.6% | 19.2% | 14.1% | 24.0% | 0.6% | 0.2% |
| LFS2005a | 8.2% | 4.1% | 7.4% | 5.8% | 12.1% | 3.2% | 20.3% | 15.0% | 23.2% | 0.7% | 0.2% |
| LFS2005b | 8.6% | 4.7% | 8.0% | 5.2% | 12.7% | 2.3% | 20.7% | 14.0% | 23.3% | 0.4% | 0.3% |
| LFS2006a | 8.4% | 4.4% | 8.0% | 5.6% | 12.4% | 4.2% | 20.5% | 13.4% | 22.8% | 0.1% | 0.2% |
| LFS2006b | 8.3% | 4.5% | 8.0% | 5.4% | 12.3% | 2.9% | 22.2% | 13.0% | 23.0% | 0.2% | 0.1% |
| LFS2007a | 8.4% | 4.3% | 7.3% | 5.6% | 12.7% | 3.1% | 20.7% | 13.8% | 22.9% | 0.9% | 0.2% |
| LFS2007b | 9.2% | 6.9% | 7.5% | 4.9% | 12.2% | 2.7% | 20.3% | 13.5% | 21.2% | 1.3% | 0.3% |
| QLFS2008Q1 | 8.9% | 5.5% | 8.2% | 5.9% | 12.7% | 1.1% | 21.8% | 12.7% | 22.6% | 0.5% | 0.0% |
| QLFS2008Q2 | 8.9% | 5.7% | 8.4% | 6.0% | 11.7% | 1.0% | 21.2% | 12.8% | 23.7% | 0.5% | 0.0% |
| QLFS2008Q3 | 9.8% | 4.9% | 8.6% | 5.9% | 12.3% | 0.9% | 21.0% | 13.4% | 22.7% | 0.5% | 0.0% |
| QLFS2008Q4 | 9.7% | 4.9% | 9.0% | 5.8% | 11.3% | 1.1% | 20.8% | 13.5% | 23.3% | 0.5% | 0.0% |
| QLFS2009Q1 | 9.8% | 5.4% | 8.8% | 5.5% | 11.8% | 1.2% | 20.6% | 14.0% | 22.4% | 0.4% | 0.0% |
| QLFS2009Q2 | 9.5% | 4.8% | 9.8% | 5.7% | 12.3% | 0.9% | 20.8% | 13.6% | 22.2% | 0.5% | 0.0% |
| QLFS2009Q3 | 9.8% | 5.3% | 9.7% | 5.9% | 12.8% | 0.8% | 19.3% | 13.0% | 22.9% | 0.5% | 0.0% |
| QLFS2009Q4 | 9.7% | 4.9% | 9.5% | 6.0% | 13.7% | 0.8% | 18.9% | 12.6% | 23.4% | 0.5% | 0.0% |

Source: Own calculations using OHS, LFS and QLFS data.

| Highly-skilled occupations: | [A]: Legislators, senior officials and managers |
|---|---|
| | [B]: Professionals |
| | [C]: Technicians and associate professionals |
| Semi-skilled occupations: | [D]: Clerks |
| | [E]: Service workers and shop and market sales |
| | [F]: Skilled agricultural and fishery worker |
| | [G]: Craft and related trade workers |
| | [H]: Plant and machinery operators and assemblers |
| Unskilled occupations: | [I]: Elementary occupations |
| | [J]: Domestic workers |
| Others: | [K]: Others / Unspecified |

Table 18: Proportion of female employed in each broad occupation category, 1995-2009

| | [A] | [B] | [C] | [D] | [E] | [F] | [G] | [H] | [I] | [J] | [K] |
|---|---|---|---|---|---|---|---|---|---|---|---|
| OHS1995 | 3.0% | 3.5% | 15.2% | 19.5% | 12.0% | 0.4% | 3.5% | 4.3% | 20.3% | 18.2% | 0.0% |
| OHS1996 | 3.6% | 4.5% | 18.1% | 14.9% | 11.1% | 1.4% | 5.6% | 2.4% | 14.5% | 18.4% | 5.4% |
| OHS1997 | 4.9% | 11.0% | 11.1% | 14.5% | 10.1% | 1.5% | 6.4% | 2.8% | 14.9% | 20.3% | 2.5% |
| OHS1998 | 4.5% | 6.0% | 13.3% | 16.7% | 12.8% | 1.4% | 4.9% | 3.2% | 17.8% | 17.3% | 2.2% |
| OHS1999 | 3.9% | 5.8% | 12.7% | 16.1% | 12.4% | 2.8% | 4.6% | 3.6% | 18.9% | 17.8% | 1.4% |
| LFS2000a | 3.0% | 3.4% | 10.5% | 13.0% | 11.0% | 15.8% | 3.8% | 3.1% | 19.1% | 17.1% | 0.2% |
| LFS2000b | 2.5% | 5.2% | 11.5% | 13.0% | 12.2% | 10.8% | 4.2% | 3.1% | 20.1% | 17.0% | 0.5% |
| LFS2001a | 2.3% | 3.9% | 11.1% | 13.5% | 14.7% | 7.2% | 4.8% | 3.0% | 24.5% | 14.6% | 0.3% |
| LFS2001b | 3.4% | 4.8% | 13.1% | 15.3% | 13.9% | 2.6% | 4.8% | 3.4% | 20.5% | 18.0% | 0.1% |
| LFS2002a | 3.6% | 4.0% | 12.2% | 15.2% | 12.1% | 8.6% | 3.8% | 3.5% | 20.0% | 16.8% | 0.3% |
| LFS2002b | 4.0% | 4.7% | 13.3% | 15.4% | 11.8% | 4.9% | 4.7% | 3.1% | 20.8% | 17.2% | 0.2% |
| LFS2003a | 3.6% | 5.1% | 12.5% | 15.3% | 12.0% | 3.9% | 4.1% | 3.7% | 22.1% | 17.4% | 0.3% |
| LFS2003b | 4.6% | 5.0% | 13.1% | 15.8% | 12.5% | 2.7% | 4.4% | 3.0% | 21.2% | 17.6% | 0.1% |
| LFS2004a | 4.5% | 5.3% | 12.2% | 17.0% | 12.0% | 2.5% | 3.9% | 2.9% | 22.5% | 17.0% | 0.1% |
| LFS2004b | 4.7% | 4.7% | 12.8% | 16.1% | 12.9% | 3.1% | 4.8% | 3.3% | 20.4% | 17.3% | 0.1% |
| LFS2005a | 4.7% | 5.0% | 12.4% | 16.0% | 12.5% | 4.2% | 4.8% | 2.7% | 21.3% | 16.1% | 0.2% |
| LFS2005b | 4.7% | 4.9% | 12.1% | 15.7% | 13.6% | 2.6% | 5.5% | 2.7% | 22.2% | 15.8% | 0.1% |
| LFS2006a | 4.8% | 5.5% | 11.4% | 15.1% | 12.6% | 6.4% | 4.8% | 2.6% | 20.9% | 15.8% | 0.2% |
| LFS2006b | 4.9% | 4.9% | 11.8% | 15.6% | 13.4% | 4.0% | 5.4% | 3.0% | 21.1% | 15.9% | 0.1% |
| LFS2007a | 5.5% | 5.2% | 12.0% | 16.0% | 13.2% | 3.6% | 4.9% | 3.0% | 20.5% | 16.2% | 0.1% |
| LFS2007b | 5.5% | 8.5% | 13.6% | 14.2% | 11.9% | 2.4% | 5.4% | 3.3% | 18.9% | 16.1% | 0.3% |
| QLFS2008Q1 | 4.6% | 5.4% | 13.5% | 17.1% | 13.9% | 0.7% | 4.8% | 2.9% | 22.0% | 15.2% | 0.0% |
| QLFS2008Q2 | 5.1% | 5.8% | 13.4% | 16.3% | 14.1% | 0.3% | 5.2% | 2.9% | 21.4% | 15.4% | 0.0% |
| QLFS2008Q3 | 5.1% | 5.9% | 13.8% | 16.7% | 14.0% | 0.5% | 4.6% | 3.1% | 20.1% | 16.2% | 0.0% |
| QLFS2008Q4 | 5.5% | 6.0% | 13.4% | 16.2% | 14.0% | 0.4% | 4.3% | 2.7% | 20.9% | 16.6% | 0.0% |
| QLFS2009Q1 | 5.2% | 6.4% | 13.7% | 16.2% | 14.6% | 0.4% | 4.0% | 2.6% | 20.2% | 16.6% | 0.0% |
| QLFS2009Q2 | 5.4% | 5.0% | 13.8% | 17.1% | 15.0% | 0.3% | 4.0% | 3.0% | 20.8% | 15.6% | 0.0% |
| QLFS2009Q3 | 5.2% | 5.6% | 13.9% | 17.5% | 15.3% | 0.3% | 3.4% | 3.0% | 20.4% | 15.5% | 0.0% |
| QLFS2009Q4 | 5.0% | 5.1% | 14.5% | 17.8% | 14.8% | 0.4% | 3.7% | 3.0% | 20.7% | 15.0% | 0.0% |

Source: Own calculations using OHS, LFS and QLFS data.

| | |
|---|---|
| Highly-skilled occupations: | [A]: Legislators, senior officials and managers |
| | [B]: Professionals |
| | [C]: Technicians and associate professionals |
| Semi-skilled occupations: | [D]: Clerks |
| | [E]: Service workers and shop and market sales |
| | [F]: Skilled agricultural and fishery worker |
| | [G]: Craft and related trade workers |
| | [H]: Plant and machinery operators and assemblers |
| Unskilled occupations: | [I]: Elementary occupations |
| | [J]: Domestic workers |
| Others: | [K]: Others / Unspecified |

Figures 9 and Figure 10 show the proportion of employed by skills level of the occupation, and it can be seen that the highly-skilled share increased slightly to about 25% in 2009 in both genders. In addition, the unskilled share was clearly higher in the case of females during the period under study (about 35% in 2009, compared to slightly above 20% in the case of males).

Figure 9: Percentage of male employed in each skill category, 1995-2009
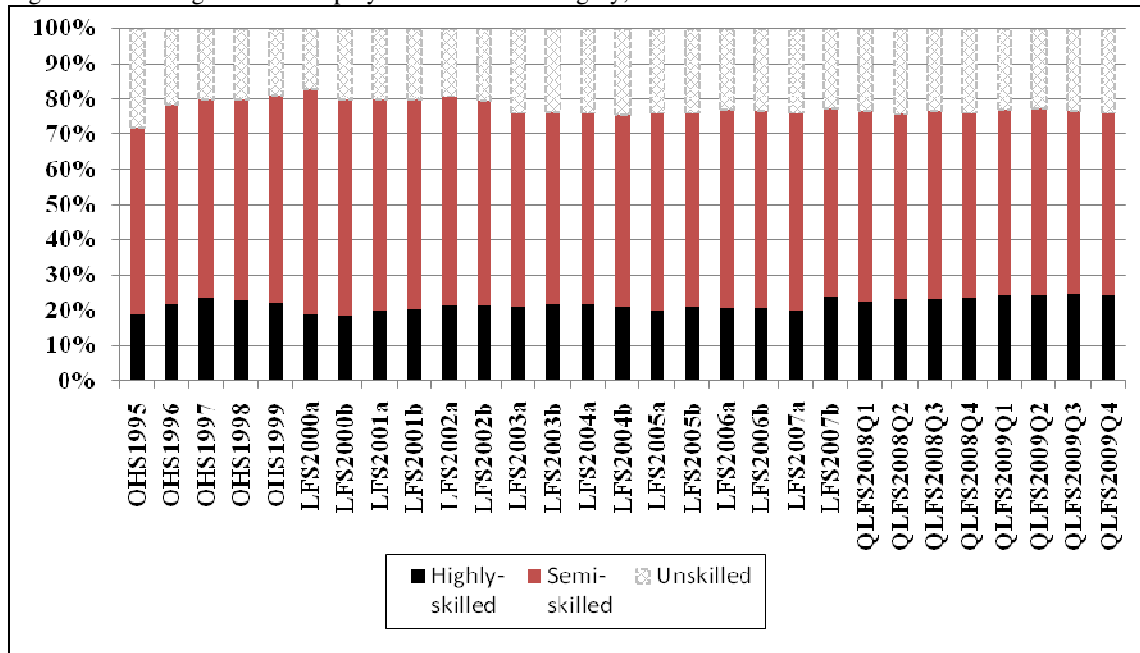


Source: Own calculations using OHS, LFS and QLFS data.

Figure 10: Percentage of female employed in each skill category, 1995-2009
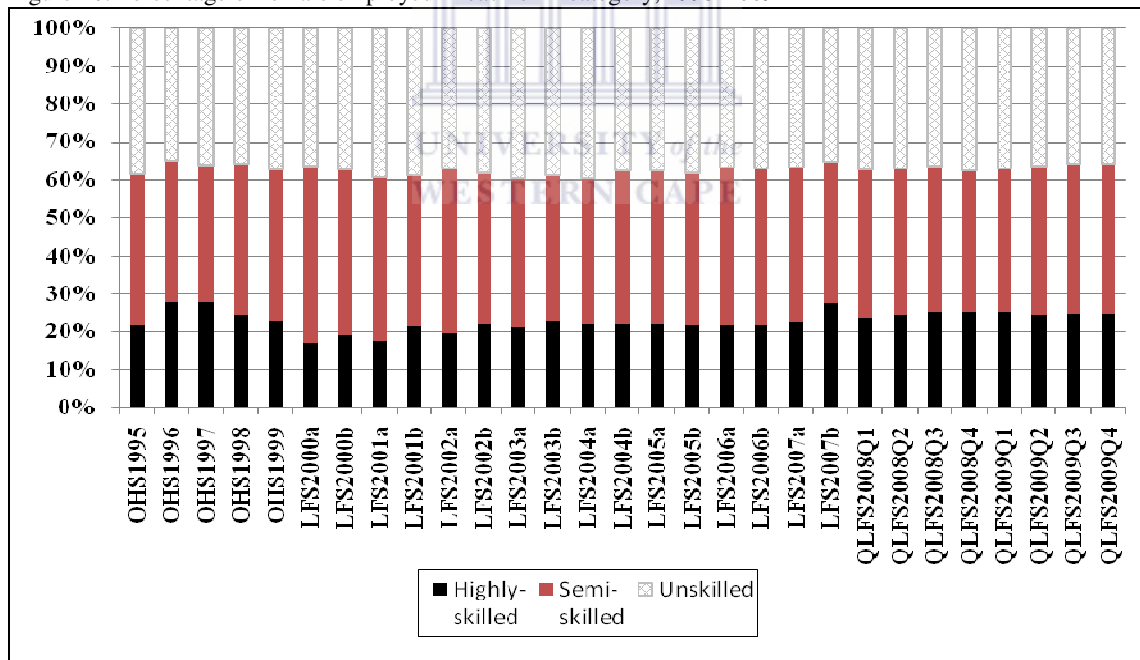


Source: Own calculations using OHS, LFS and QLFS data.

Tables 19 and 20 show the gender shares of employed by broad industry category. In male employed, the share involved in wholesale and retail industry was the highest during the period under study (increasing from 15% in the OHSs to slightly above 20% in QLFSs). Looking at the female employed, the shares involved in wholesale and retail as well as community / social / personal services were most dominant (approximately 25% each).

Furthermore, a higher share of female employed worked in private households[22] (between 13%-18% in the surveys under study, compared with only about 3% in males). This finding is consistent with what was found in Casale and Posel (2002) and Ntuli (2007), who noted that feminization of the employment was highly associated with a higher share of females involving in unskilled, less secure and low-paying employment activities.

Table 19: Proportion of male employed in each broad industry category, 1995-2009

|  | [A] | [B] | [C] | [D] | [E] | [F] | [G] | [H] | [I] | [J] | [K] |
|---|---|---|---|---|---|---|---|---|---|---|---|
| OHS1995 | 16.9% | 7.3% | 16.8% | 1.3% | 7.2% | 15.9% | 7.0% | 5.5% | 18.6% | 1.7% | 1.9% |
| OHS1996 | 10.7% | 4.4% | 17.7% | 2.0% | 7.4% | 14.0% | 7.6% | 8.6% | 17.6% | 3.0% | 7.0% |
| OHS1997 | 9.4% | 6.7% | 18.8% | 1.8% | 8.6% | 15.7% | 8.1% | 7.8% | 16.3% | 3.0% | 3.9% |
| OHS1998 | 12.0% | 7.5% | 16.1% | 1.6% | 9.2% | 17.1% | 8.1% | 9.5% | 15.3% | 1.9% | 1.7% |
| OHS1999 | 12.0% | 7.5% | 16.4% | 1.1% | 8.7% | 18.1% | 7.5% | 8.9% | 15.4% | 3.0% | 1.5% |
| LFS2000a | 17.9% | 7.0% | 14.8% | 1.1% | 8.9% | 19.1% | 6.9% | 7.2% | 13.4% | 3.1% | 0.6% |
| LFS2000b | 15.3% | 8.4% | 14.7% | 1.1% | 9.1% | 18.3% | 7.1% | 8.5% | 13.4% | 3.1% | 0.9% |
| LFS2001a | 13.9% | 8.1% | 15.2% | 1.3% | 8.6% | 20.2% | 7.0% | 8.4% | 13.6% | 3.1% | 0.7% |
| LFS2001b | 12.9% | 8.3% | 16.2% | 1.3% | 8.9% | 19.3% | 7.0% | 9.0% | 14.1% | 2.6% | 0.4% |
| LFS2002a | 15.7% | 7.9% | 15.8% | 1.0% | 7.7% | 17.8% | 7.0% | 9.4% | 13.9% | 3.3% | 0.5% |
| LFS2002b | 14.2% | 8.1% | 16.4% | 1.0% | 8.2% | 17.0% | 7.1% | 10.2% | 14.0% | 3.2% | 0.6% |
| LFS2003a | 13.1% | 8.2% | 15.7% | 1.0% | 8.4% | 18.4% | 7.1% | 9.2% | 14.9% | 3.6% | 0.4% |
| LFS2003b | 12.8% | 8.0% | 15.5% | 1.0% | 8.8% | 18.7% | 6.4% | 10.0% | 15.1% | 3.3% | 0.3% |
| LFS2004a | 12.7% | 8.1% | 16.3% | 1.2% | 9.0% | 18.5% | 7.1% | 9.6% | 14.2% | 3.1% | 0.3% |
| LFS2004b | 10.4% | 5.8% | 16.5% | 1.1% | 11.0% | 19.9% | 6.5% | 10.3% | 14.9% | 3.4% | 0.2% |
| LFS2005a | 10.6% | 5.9% | 15.7% | 1.5% | 10.7% | 19.9% | 6.7% | 9.8% | 15.3% | 3.6% | 0.2% |
| LFS2005b | 8.6% | 5.5% | 15.8% | 1.1% | 12.2% | 21.9% | 7.0% | 10.5% | 14.2% | 3.1% | 0.3% |
| LFS2006a | 10.8% | 5.4% | 16.1% | 1.0% | 10.8% | 21.8% | 6.6% | 9.8% | 14.2% | 3.3% | 0.2% |
| LFS2006b | 9.0% | 5.1% | 15.7% | 1.3% | 12.4% | 21.6% | 6.7% | 10.4% | 14.4% | 3.1% | 0.3% |
| LFS2007a | 9.2% | 6.0% | 16.1% | 1.1% | 12.1% | 21.1% | 6.5% | 10.9% | 13.8% | 3.1% | 0.1% |
| LFS2007b | 9.1% | 5.3% | 16.0% | 0.9% | 12.0% | 19.4% | 7.1% | 11.3% | 15.0% | 3.4% | 0.4% |
| QLFS2008Q1 | 6.7% | 3.9% | 17.4% | 1.0% | 13.2% | 20.5% | 7.8% | 12.3% | 13.9% | 3.3% | 0.0% |
| QLFS2008Q2 | 7.0% | 4.0% | 17.0% | 0.9% | 13.2% | 20.1% | 7.9% | 12.2% | 14.3% | 3.3% | 0.0% |
| QLFS2008Q3 | 6.7% | 3.7% | 17.2% | 0.9% | 13.0% | 21.0% | 8.1% | 11.9% | 14.0% | 3.5% | 0.0% |
| QLFS2008Q4 | 6.8% | 3.6% | 17.5% | 0.8% | 13.9% | 20.1% | 8.2% | 11.4% | 14.2% | 3.5% | 0.0% |
| QLFS2009Q1 | 6.6% | 3.8% | 16.9% | 0.9% | 13.5% | 20.2% | 8.0% | 12.6% | 13.9% | 3.6% | 0.0% |
| QLFS2009Q2 | 6.7% | 3.7% | 16.9% | 0.9% | 13.4% | 20.1% | 7.8% | 12.6% | 14.5% | 3.3% | 0.0% |
| QLFS2009Q3 | 6.1% | 3.6% | 16.2% | 0.9% | 13.0% | 20.1% | 8.1% | 13.2% | 15.3% | 3.5% | 0.0% |
| QLFS2009Q4 | 5.7% | 3.6% | 16.1% | 1.1% | 13.2% | 20.3% | 7.9% | 13.9% | 14.7% | 3.4% | 0.0% |

Source: Own calculations using OHS, LFS and QLFS data.

| Primary | [A]: Agriculture/Forestry/Fishing/Hunting |
|---|---|
|  | [B]: Mining/Quarrying |
| Secondary | [C]: Manufacturing |
|  | [D]: Electricity |
|  | [E]: Construction |
| Tertiary | [F]: Wholesale/Retail |
|  | [G]: Transport/Storage/Communications |
|  | [H]: Financial/Insurance/Business Services |
|  | [I]: Community/Social/Personal Services |
| Other | [J]: Private Households |
|  | [K]: Unspecified |

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[22] Employment in the private households mostly involves domestic work activities.

Table 20: Proportion of female employed in each broad industry category, 1995-2009

| | [A] | [B] | [C] | [D] | [E] | [F] | [G] | [H] | [I] | [J] | [K] |
|---|---|---|---|---|---|---|---|---|---|---|---|
| OHS1995 | 6.9% | 0.5% | 12.4% | 0.3% | 0.8% | 20.1% | 1.9% | 7.1% | 29.5% | 18.8% | 1.7% |
| OHS1996 | 5.2% | 0.5% | 12.2% | 0.5% | 0.7% | 17.3% | 2.0% | 8.0% | 29.6% | 17.7% | 6.4% |
| OHS1997 | 6.7% | 0.6% | 13.5% | 0.4% | 1.0% | 19.7% | 2.3% | 8.3% | 27.3% | 16.6% | 3.5% |
| OHS1998 | 7.0% | 0.4% | 12.6% | 0.5% | 0.8% | 21.9% | 2.6% | 8.5% | 26.3% | 17.7% | 1.7% |
| OHS1999 | 8.7% | 0.6% | 11.7% | 0.3% | 1.0% | 22.8% | 2.0% | 9.0% | 24.3% | 18.1% | 1.5% |
| LFS2000a | 20.7% | 0.5% | 9.7% | 0.3% | 0.6% | 22.1% | 2.0% | 6.8% | 19.0% | 17.8% | 0.5% |
| LFS2000b | 16.1% | 0.3% | 10.5% | 0.3% | 0.9% | 22.7% | 1.6% | 7.3% | 21.8% | 17.6% | 0.8% |
| LFS2001a | 11.5% | 0.3% | 10.7% | 0.3% | 1.0% | 30.6% | 1.9% | 8.0% | 20.0% | 15.0% | 0.6% |
| LFS2001b | 7.3% | 0.4% | 12.1% | 0.3% | 1.3% | 25.6% | 2.0% | 9.6% | 22.8% | 18.3% | 0.4% |
| LFS2002a | 14.0% | 0.4% | 11.0% | 0.3% | 1.4% | 22.8% | 2.2% | 8.4% | 21.8% | 17.3% | 0.5% |
| LFS2002b | 10.2% | 0.5% | 11.8% | 0.4% | 1.3% | 22.9% | 2.2% | 8.7% | 23.8% | 17.5% | 0.7% |
| LFS2003a | 9.2% | 0.5% | 11.8% | 0.5% | 1.0% | 23.5% | 2.4% | 9.1% | 23.9% | 17.8% | 0.4% |
| LFS2003b | 7.6% | 0.5% | 10.8% | 0.5% | 1.7% | 24.8% | 2.3% | 9.1% | 24.6% | 17.8% | 0.3% |
| LFS2004a | 8.7% | 0.5% | 10.8% | 0.5% | 1.3% | 23.7% | 2.4% | 9.1% | 25.6% | 17.2% | 0.2% |
| LFS2004b | 7.4% | 0.2% | 12.3% | 0.5% | 1.6% | 24.6% | 2.5% | 9.3% | 24.2% | 17.4% | 0.2% |
| LFS2005a | 8.8% | 0.4% | 11.4% | 0.4% | 1.5% | 25.5% | 2.5% | 9.2% | 23.5% | 16.5% | 0.3% |
| LFS2005b | 6.0% | 0.4% | 11.3% | 0.4% | 1.5% | 28.2% | 2.4% | 10.6% | 22.7% | 16.2% | 0.1% |
| LFS2006a | 10.3% | 0.3% | 10.9% | 0.5% | 1.7% | 27.1% | 1.6% | 9.3% | 22.0% | 15.9% | 0.3% |
| LFS2006b | 7.8% | 0.4% | 10.8% | 0.4% | 2.1% | 26.9% | 2.3% | 10.0% | 23.1% | 16.1% | 0.1% |
| LFS2007a | 7.5% | 0.4% | 10.9% | 0.4% | 1.6% | 26.6% | 1.9% | 9.8% | 24.3% | 16.4% | 0.2% |
| LFS2007b | 6.2% | 0.5% | 9.5% | 0.5% | 2.6% | 25.5% | 2.8% | 11.0% | 24.7% | 16.3% | 0.4% |
| QLFS2008Q1 | 4.8% | 0.6% | 11.0% | 0.4% | 1.8% | 26.5% | 2.5% | 12.2% | 25.0% | 15.2% | 0.0% |
| QLFS2008Q2 | 4.2% | 0.6% | 10.9% | 0.4% | 2.0% | 25.9% | 2.8% | 12.3% | 25.4% | 15.4% | 0.0% |
| QLFS2008Q3 | 4.2% | 0.5% | 10.1% | 0.5% | 1.8% | 26.1% | 2.5% | 12.0% | 25.5% | 16.7% | 0.0% |
| QLFS2008Q4 | 3.9% | 0.7% | 9.7% | 0.4% | 1.9% | 26.4% | 2.3% | 12.4% | 25.6% | 16.9% | 0.0% |
| QLFS2009Q1 | 3.9% | 0.7% | 9.9% | 0.5% | 1.8% | 24.6% | 2.6% | 12.7% | 26.4% | 16.9% | 0.0% |
| QLFS2009Q2 | 3.6% | 0.7% | 10.4% | 0.4% | 2.1% | 24.6% | 2.5% | 13.1% | 26.6% | 15.9% | 0.0% |
| QLFS2009Q3 | 3.8% | 0.7% | 10.0% | 0.3% | 2.3% | 24.5% | 2.8% | 13.0% | 26.6% | 15.9% | 0.1% |
| QLFS2009Q4 | 3.6% | 0.6% | 10.1% | 0.3% | 2.4% | 24.4% | 3.0% | 13.1% | 27.1% | 15.4% | 0.0% |

Source: Own calculations using OHS, LFS and QLFS data.
Primary       [A]: Agriculture/Forestry/Fishing/Hunting
              [B]: Mining/Quarrying
Secondary     [C]: Manufacturing
              [D]: Electricity
              [E]: Construction
Tertiary      [F]: Wholesale/Retail
              [G]: Transport/Storage/Communications
              [H]: Financial/Insurance/Business Services
              [I]: Community/Social/Personal Services
Other         [J]: Private Households
              [K]: Unspecified

3.4.4 Earnings trends of the employed

This section briefly analyzes the earnings trends of the employed since OHS1995. The South African labour market earnings data has been characterized by inconsistencies due to various reasons, ranging from changes in questionnaire designs to capture earnings data to over-estimation of informal, self-employed workers in the OHSs. Following the methodology adopted in Burger and Yu (2007) that takes into account the incomparability issues between

the OHSs and the LFSs, as well as the elimination of outliers (people reporting excessively high earnings), individuals with zero earnings, the self-employed and the informal sector workers whose earnings were very unstable, this section attempts to create a reasonable earnings trends between 1995 and 2007[23].

First, Figure 11 shows the mean real monthly earnings of <u>all employed</u> by gender. The figure shows that except for LFS2007a, males earned more than their female counterparts on average throughout the entire period under investigation. The figure also shows that both genders recorded abrupt increases in mean earnings in LFS2000b (which was attributed to the presence of a relatively high proportion of outliers – people declaring monthly earnings of more than R200,000 (2000 prices) from the main job (Burger and Yu 2007)). Also, the mean earnings were higher in both genders in the OHS years, and as explained before, this was attributed to the serious over-estimation of the earnings of the self-employed and the informal sector workers (Burger and Yu 2007) in the OHSs[24].

Figure 11: Means monthly earnings (2000 prices) of all the employed by gender, 1995-2007
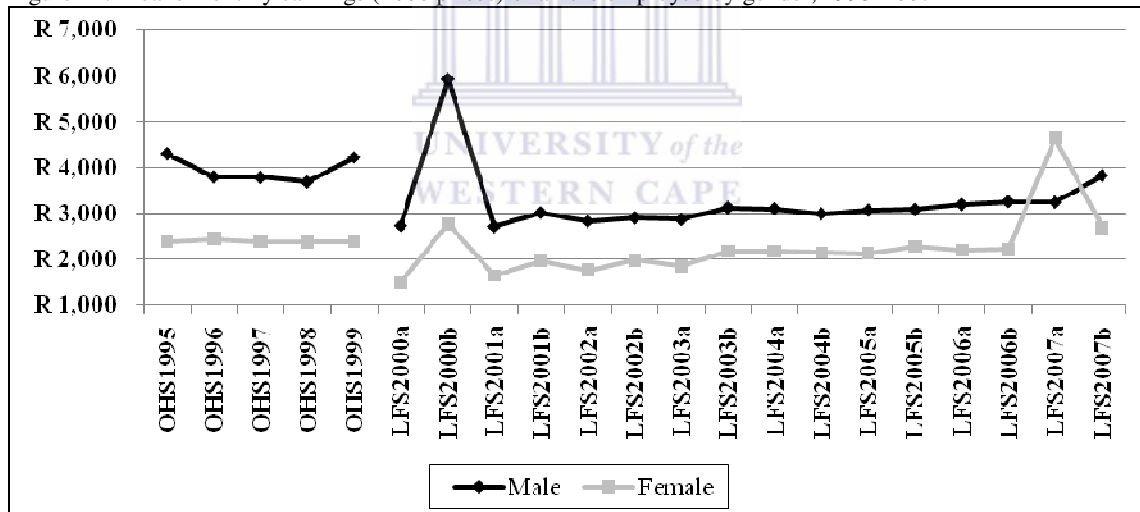


Source: Own calculations using OHS and LFS data.

The mean monthly earnings of the employed after <u>excluding zero-earners and outliers</u> are presented in Figure 12 and it can be seen that the earnings trends are smoother (e.g., the abrupt increase in LFS2000b as found in Figure 11 no longer happens in Figure 12). However, the mean earnings in the OHS years remain relatively higher.

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[23] The earnings questions were not asked since the introduction of the QLFSs. However, the question has been asked again recently QLFS2010Q3 and QLFS2010Q4, but Stats SA only released the earnings data in the former survey in the official data CD.

[24] Burger and Yu (2007) defined outliers as respondents declaring monthly earnings of more than R200,000 (2000 prices) from the main job.

Figure 12: Means monthly earnings (2000 prices) of the employed by gender, after excluding zero-earners and outliers, 1995-2007
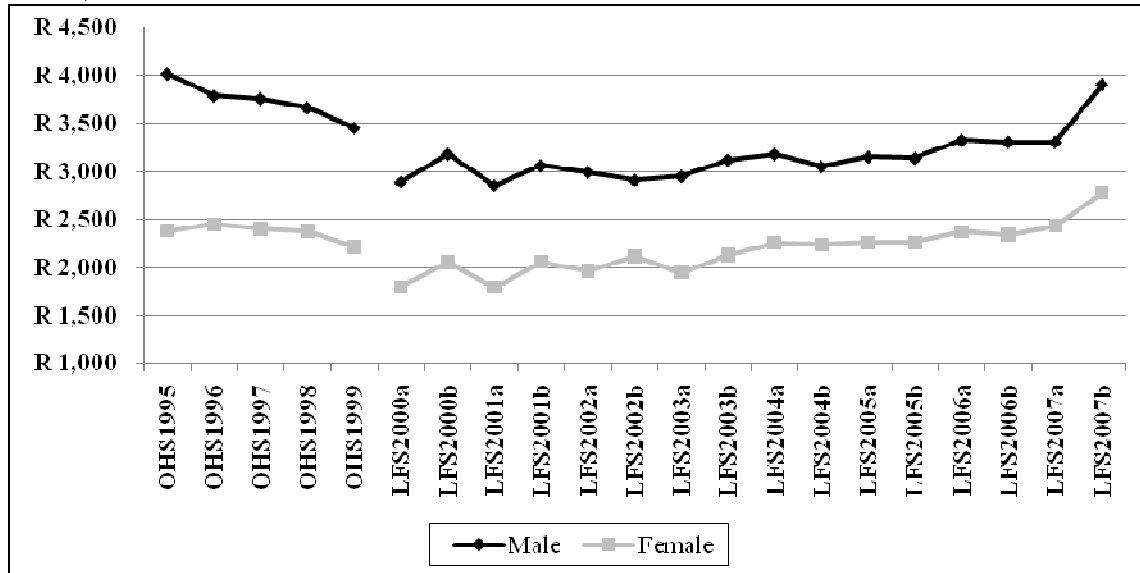


Source: Own calculations using OHS and LFS data.

After <u>excluding the self-employed</u>, Figure 13 shows that the mean earnings trends become even more stable in both genders. In fact, the mean earnings showed a slight upward trend between OHS1995 and LFS2007b. Finally, similar findings are observed after <u>excluding informal sector workers</u> (who also display erratic earnings), as shown in Figure 14[25].

Figure 13: Means monthly earnings (2000 prices) of the employed by gender, after excluding zero-earners, outliers and self-employed, 1995-2007
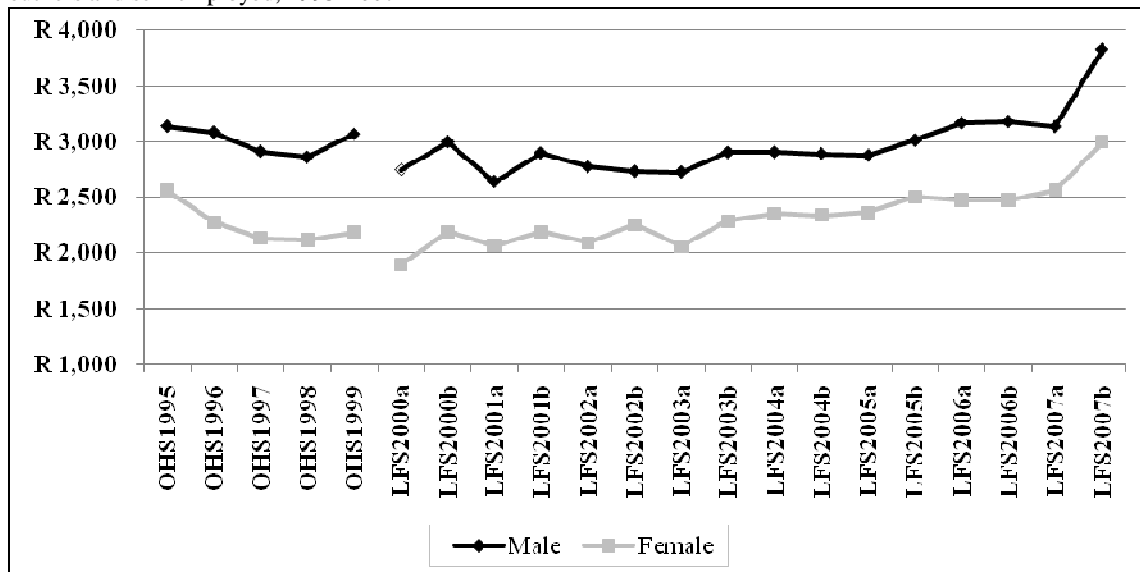


Source: Own calculations using OHS and LFS data.

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[25] This figure only presents the mean earnings trends since OHS1997 since employees were not asked to declare formal/informal sector status in OHS1995-1996, as mentioned in footnote 21.

Figure 14: Means monthly earnings (2000 prices) of the employed by gender, after excluding zero-earners, outliers, self-employed and informal sector workers, 1995-2007
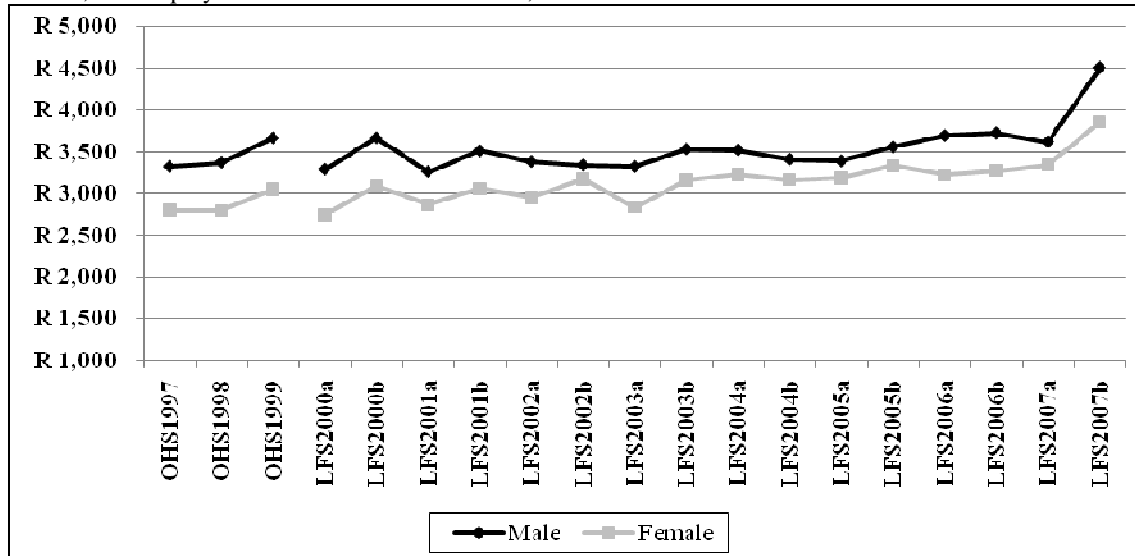


Source: Own calculations using OHS and LFS data.

Tables 21 and Table 22 provides more information by showing the mean real monthly earnings by race and educational attainment, in each gender between 1997 and 2007 using the same approach as in Figure 14. The table shows that Whites with higher educational attainment earned more on average in both genders. The results are similar to what was found by Burger and Jafta (2007).

Table 21: Mean monthly earnings (2000 prices) of the employed by gender and race, after excluding zero-earners, outliers, self-employed and informal sector workers, 1997-2007

|  | **Male** | | | | **Female** | | | |
|---|---|---|---|---|---|---|---|---|
|  | **African** | **Coloured** | **Indian** | **White** | **African** | **Coloured** | **Indian** | **White** |
| OHS1997 | 2,254 | 2,701 | 3,680 | 6,846 | 2,135 | 2,187 | 2,672 | 4,327 |
| OHS1998 | 2,412 | 2,917 | 4,346 | 6,505 | 2,193 | 2,364 | 2,663 | 4,153 |
| OHS1999 | 2,424 | 3,002 | 4,140 | 8,269 | 2,388 | 2,557 | 2,962 | 4,538 |
| LFS2000a | 2,120 | 2,740 | 3,439 | 7,401 | 2,106 | 2,293 | 3,130 | 4,147 |
| LFS2000b | 2,228 | 3,316 | 3,929 | 8,410 | 2,303 | 2,647 | 2,953 | 4,820 |
| LFS2001a | 2,178 | 3,042 | 3,771 | 7,008 | 2,140 | 2,485 | 3,065 | 4,499 |
| LFS2001b | 2,216 | 2,993 | 3,905 | 7,921 | 2,241 | 2,394 | 2,984 | 4,915 |
| LFS2002a | 2,235 | 2,981 | 4,028 | 7,438 | 2,292 | 2,349 | 2,792 | 4,675 |
| LFS2002b | 2,242 | 2,866 | 3,542 | 7,674 | 2,490 | 2,441 | 2,837 | 5,137 |
| LFS2003a | 2,208 | 2,919 | 3,686 | 7,582 | 2,196 | 2,308 | 2,963 | 4,611 |
| LFS2003b | 2,302 | 3,044 | 4,291 | 8,661 | 2,430 | 2,586 | 3,381 | 5,140 |
| LFS2004a | 2,340 | 3,360 | 4,943 | 7,896 | 2,517 | 2,476 | 4,120 | 5,174 |
| LFS2004b | 2,367 | 2,903 | 4,312 | 7,975 | 2,415 | 2,567 | 3,492 | 5,489 |
| LFS2005a | 2,483 | 2,999 | 4,839 | 7,442 | 2,497 | 2,598 | 3,493 | 5,157 |
| LFS2005b | 2,498 | 3,439 | 4,049 | 8,038 | 2,716 | 2,738 | 2,943 | 5,275 |
| LFS2006a | 2,543 | 3,302 | 4,445 | 8,206 | 2,521 | 2,647 | 3,350 | 5,273 |
| LFS2006b | 2,638 | 3,143 | 5,586 | 8,366 | 2,548 | 2,530 | 3,782 | 5,577 |
| LFS2007a | 2,555 | 3,714 | 5,381 | 8,053 | 2,674 | 2,773 | 4,060 | 5,391 |
| LFS2007b | 2,699 | 3,476 | 12,398 | 11,138 | 2,538 | 3,123 | 4,896 | 7,914 |

Source: Own calculations using OHS and LFS data.

Table 22: Mean monthly earnings (2000 prices) of the employed by gender and educational attainment, after excluding zero-earners, outliers, self-employed and informal sector workers, 1997-2007

| | Male | | | | Female | | | |
|---|---|---|---|---|---|---|---|---|
| | Without Matric | Matric | Matric + Cert/Dip | Degree | Without Matric | Matric | Matric + Cert/Dip | Degree |
| OHS1997 | 2,209 | 4,081 | 5,589 | 8,243 | 1,797 | 3,011 | 3,918 | 5,441 |
| OHS1998 | 2,318 | 3,747 | 6,024 | 9,322 | 1,719 | 3,175 | 3,810 | 5,095 |
| OHS1999 | 2,245 | 4,158 | 6,725 | 10,419 | 1,957 | 3,005 | 4,386 | 5,851 |
| LFS2000a | 2,037 | 3,643 | 5,416 | 11,556 | 1,662 | 2,858 | 4,014 | 5,522 |
| LFS2000b | 2,126 | 3,550 | 6,162 | 12,042 | 1,800 | 2,816 | 4,176 | 6,262 |
| LFS2001a | 2,033 | 3,549 | 5,590 | 9,031 | 1,698 | 2,718 | 4,052 | 6,062 |
| LFS2001b | 2,025 | 3,903 | 5,830 | 10,320 | 1,650 | 2,947 | 4,236 | 6,531 |
| LFS2002a | 1,959 | 3,671 | 5,593 | 9,881 | 1,723 | 2,877 | 4,266 | 5,749 |
| LFS2002b | 1,913 | 3,458 | 5,747 | 10,155 | 1,706 | 3,045 | 4,235 | 6,821 |
| LFS2003a | 1,884 | 3,352 | 5,928 | 10,171 | 1,514 | 2,778 | 4,115 | 5,666 |
| LFS2003b | 1,915 | 3,629 | 6,716 | 10,941 | 1,619 | 2,947 | 4,507 | 6,905 |
| LFS2004a | 2,021 | 3,904 | 6,482 | 10,243 | 1,746 | 2,856 | 4,487 | 7,101 |
| LFS2004b | 1,948 | 3,786 | 5,988 | 10,982 | 1,671 | 3,020 | 4,440 | 7,543 |
| LFS2005a | 2,020 | 3,510 | 5,677 | 10,666 | 1,570 | 2,941 | 4,489 | 7,261 |
| LFS2005b | 2,053 | 3,656 | 6,023 | 11,366 | 1,738 | 2,796 | 4,432 | 8,749 |
| LFS2006a | 2,113 | 3,615 | 6,055 | 11,213 | 1,655 | 2,936 | 4,077 | 8,295 |
| LFS2006b | 2,065 | 3,539 | 7,080 | 12,041 | 1,660 | 2,833 | 4,661 | 8,730 |
| LFS2007a | 2,117 | 3,470 | 6,279 | 12,111 | 1,648 | 2,903 | 4,810 | 8,383 |
| LFS2007b | 2,083 | 3,358 | 7,318 | 18,811 | 1,762 | 2,720 | 4,471 | 11,874 |

Source: Own calculations using OHS and LFS data.

Finally, Figure 15, Table 23 and Table 24 present information on mean hourly wage trends, adopting the same approach used in Figure 14. Once again, the results show that mean hourly wage of the employed had a slight upward trend since OHS1995. In addition, there is a positive relationship between educational attainment and mean hourly wage. Finally, the Whites earned more on average.

Figure 15: Mean hourly wage (2000 prices) rates by gender, after excluding zero-earners, outliers, self-employed and informal sector workers, 1997-2007



Source: Own calculations using OHS and LFS data.

Table 23: Mean hourly wage (2000 prices) of the employed by gender and race, after excluding zero-earners, outliers, self-employed and informal sector workers, 1997-2007

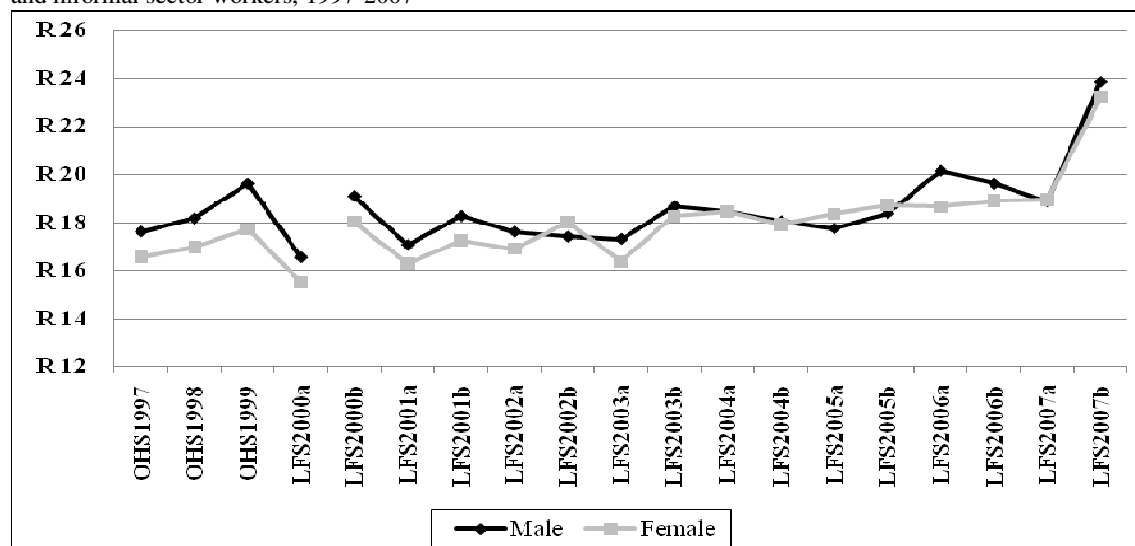|  | Male | | | | Female | | | |
|---|---|---|---|---|---|---|---|---|
|  | **African** | **Coloured** | **Indian** | **White** | **African** | **Coloured** | **Indian** | **White** |
| OHS1997 | 12.12 | 15.01 | 19.60 | 35.33 | 12.46 | 13.06 | 15.60 | 25.91 |
| OHS1998 | 12.87 | 17.02 | 23.28 | 34.90 | 12.83 | 14.00 | 18.24 | 25.93 |
| OHS1999 | 13.15 | 17.03 | 22.42 | 43.13 | 13.72 | 14.85 | 18.29 | 26.50 |
| LFS2000a | 10.80 | 13.78 | 17.69 | 36.61 | 11.94 | 12.97 | 18.19 | 23.14 |
| LFS2000b | 11.81 | 17.13 | 20.81 | 43.10 | 13.38 | 15.18 | 17.63 | 28.21 |
| LFS2001a | 11.26 | 16.23 | 19.43 | 36.88 | 12.22 | 14.27 | 17.28 | 25.36 |
| LFS2001b | 11.66 | 16.02 | 20.51 | 40.47 | 12.73 | 13.76 | 16.31 | 27.57 |
| LFS2002a | 11.59 | 16.24 | 21.51 | 38.26 | 12.95 | 13.24 | 15.30 | 27.40 |
| LFS2002b | 11.85 | 16.72 | 18.25 | 38.33 | 14.52 | 14.17 | 15.57 | 28.15 |
| LFS2003a | 11.57 | 15.93 | 20.19 | 38.58 | 12.72 | 13.06 | 18.82 | 26.30 |
| LFS2003b | 12.28 | 16.80 | 22.96 | 44.74 | 14.10 | 14.85 | 19.33 | 29.60 |
| LFS2004a | 12.29 | 18.28 | 26.41 | 40.79 | 14.48 | 14.11 | 24.85 | 29.06 |
| LFS2004b | 12.52 | 15.73 | 23.03 | 41.90 | 13.74 | 14.51 | 19.82 | 30.84 |
| LFS2005a | 12.99 | 16.19 | 26.73 | 38.27 | 14.34 | 15.07 | 21.88 | 29.40 |
| LFS2005b | 12.77 | 18.33 | 20.49 | 41.86 | 15.21 | 15.44 | 15.83 | 29.99 |
| LFS2006a | 13.47 | 18.05 | 23.82 | 46.56 | 14.38 | 14.93 | 18.52 | 31.46 |
| LFS2006b | 13.95 | 17.30 | 30.31 | 43.23 | 14.30 | 14.65 | 26.40 | 32.42 |
| LFS2007a | 13.25 | 20.29 | 31.02 | 40.97 | 15.13 | 16.03 | 22.03 | 30.55 |
| LFS2007b | 14.25 | 18.75 | 65.17 | 59.42 | 14.69 | 18.40 | 27.18 | 50.05 |

Source: Own calculations using OHS and LFS data.

Table 24: Mean hourly wage (2000 prices) of the employed by gender and educational attainment, after excluding zero-earners, outliers, self-employed and informal sector workers, 1997-2007

|  | Male | | | | Female | | | |
|---|---|---|---|---|---|---|---|---|
|  | **Without Matric** | **Matric** | **Matric + Cert/Dip** | **Degree** | **Without Matric** | **Matric** | **Matric + Cert/Dip** | **Degree** |
| OHS1997 | 11.47 | 21.42 | 30.92 | 45.06 | 9.89 | 17.53 | 25.62 | 32.73 |
| OHS1998 | 11.95 | 20.36 | 33.55 | 53.63 | 9.71 | 19.10 | 24.44 | 32.68 |
| OHS1999 | 11.95 | 22.28 | 37.57 | 54.99 | 10.62 | 17.62 | 26.70 | 34.89 |
| LFS2000a | 10.12 | 18.40 | 28.02 | 57.74 | 9.10 | 16.13 | 23.05 | 31.78 |
| LFS2000b | 10.78 | 18.73 | 33.09 | 62.93 | 10.47 | 16.02 | 25.33 | 36.17 |
| LFS2001a | 10.43 | 17.94 | 31.04 | 48.89 | 9.32 | 15.00 | 24.11 | 35.59 |
| LFS2001b | 10.28 | 20.33 | 31.65 | 53.71 | 8.98 | 16.37 | 25.12 | 36.98 |
| LFS2002a | 9.92 | 18.84 | 30.92 | 52.43 | 9.76 | 16.17 | 25.09 | 33.34 |
| LFS2002b | 9.72 | 18.16 | 31.44 | 52.59 | 9.26 | 17.08 | 24.60 | 39.58 |
| LFS2003a | 9.71 | 17.53 | 32.40 | 52.02 | 8.39 | 16.04 | 24.23 | 33.50 |
| LFS2003b | 9.97 | 19.24 | 36.10 | 58.20 | 9.24 | 16.64 | 27.23 | 39.54 |
| LFS2004a | 10.31 | 20.27 | 34.97 | 55.96 | 9.86 | 15.90 | 26.13 | 41.40 |
| LFS2004b | 10.18 | 19.94 | 32.83 | 57.60 | 9.34 | 16.57 | 26.81 | 42.11 |
| LFS2005a | 10.30 | 17.82 | 31.41 | 59.09 | 8.59 | 16.47 | 27.24 | 42.88 |
| LFS2005b | 10.24 | 18.72 | 32.24 | 60.93 | 9.31 | 15.47 | 26.03 | 49.79 |
| LFS2006a | 10.95 | 18.81 | 33.14 | 68.90 | 10.04 | 16.25 | 24.24 | 48.22 |
| LFS2006b | 10.78 | 18.50 | 38.41 | 63.41 | 9.09 | 15.91 | 28.81 | 50.48 |
| LFS2007a | 10.79 | 18.11 | 34.20 | 62.96 | 9.36 | 16.21 | 27.74 | 47.41 |
| LFS2007b | 10.92 | 17.59 | 40.25 | 98.99 | 10.09 | 15.38 | 26.64 | 76.03 |

Source: Own calculations using OHS and LFS data.

To conclude section 3.4, it was found that feminization of employment did not take place

since the transition. Besides, a relatively higher proportion of female employed was involved in low-pay, unskilled and informal activities.

## 3.5   Unemployment trends

Table 25 and Figure 16 show the narrow[26] unemployment rates for both genders between 1995 and 2009. Overall, the female unemployment rates were always higher. Both genders experienced an upward trend in the unemployment rates in OHS1995-1998. However, in OHS1999, unemployment rates of both genders decreased. Figure 16 also shows that during the change over from the OHS to the LFS, the male unemployment rate experienced a greater increase (5.1 percentage points, compared with only 1.1 percentage points in females. The unemployment rates in both gender showed an upward trend for both genders until LFS2003a (i.e., jobless growth under the second definition did take place between OHS1995 and LFS2003a, as the increase in real GDP was complemented by rising unemployment rates in both genders), after which the rates displayed a downward trend in general. Nonetheless, between the two 2007 LFSs, female unemployment rate suddenly declined by 4.7 percentage points (decreasing from 30.8% to 26.1%). It was since LFS2007b that the (male unemployment rate – female unemployment rate) difference started to show an obvious decrease. The difference narrowed to as low as 3.2 percentage points in QLFS2009Q4.

Table 25: Narrow unemployed and unemployment rates by gender, 1995-2009

|  | Number of unemployed (1 000s) | | Unemployment rates | |
|---|---|---|---|---|
|  | Male | Female | Male | Female |
| OHS1995 | 923 | 1,104 | 13.8% | 22.9% |
| OHS1996 | 1,028 | 1,195 | 16.2% | 24.7% |
| OHS1997 | 1,168 | 1,282 | 17.4% | 26.5% |
| OHS1998 | 1,546 | 1,611 | 21.5% | 30.1% |
| OHS1999 | 1,477 | 1,675 | 19.8% | 27.8% |
| LFS2000a | 2,089 | 2,241 | 24.9% | 28.7% |
| LFS2000b | 1,980 | 2,175 | 22.2% | 29.2% |
| LFS2001a | 2,208 | 2,198 | 24.6% | 28.6% |
| LFS2001b | 2,232 | 2,416 | 25.8% | 33.8% |
| LFS2002a | 2,327 | 2,562 | 26.1% | 33.9% |
| LFS2002b | 2,313 | 2,616 | 25.9% | 35.9% |
| LFS2003a | 2,435 | 2,675 | 27.2% | 35.9% |
| LFS2003b | 2,163 | 2,265 | 24.7% | 32.0% |
| LFS2004a | 2,078 | 2,326 | 23.9% | 32.9% |
| LFS2004b | 2,026 | 2,100 | 23.1% | 30.2% |

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[26] Figure A.2 in the Appendix shows abrupt declines in the broad unemployment rates between LFS2007 and QLFS2008Q1, confirming the findings of Yu (2009) that the LFS and QLFS broad labour market status derivation methodologies are not comparable.

Table 25: Continued

| | Number of unemployed (1 000s) | | Unemployment rates | |
| --- | --- | --- | --- | --- |
| | Male | Female | Male | Female |
| LFS2005a | 1,994 | 2,282 | 22.4% | 31.4% |
| LFS2005b | 2,055 | 2,424 | 22.6% | 31.7% |
| LFS2006a | 1,952 | 2,315 | 21.6% | 30.3% |
| LFS2006b | 1,964 | 2,421 | 21.2% | 30.7% |
| LFS2007a | 1,942 | 2,388 | 21.1% | 30.8% |
| LFS2007b | 1,860 | 2,037 | 19.8% | 26.1% |
| QLFS2008Q1 | 1,982 | 2,207 | 20.6% | 26.9% |
| QLFS2008Q2 | 1,912 | 2,202 | 19.9% | 26.7% |
| QLFS2008Q3 | 1,971 | 2,148 | 20.5% | 26.3% |
| QLFS2008Q4 | 1,803 | 2,067 | 18.9% | 25.3% |
| QLFS2009Q1 | 2,034 | 2,146 | 21.2% | 26.1% |
| QLFS2009Q2 | 2,059 | 2,062 | 21.8% | 25.6% |
| QLFS2009Q3 | 2,111 | 2,078 | 22.9% | 26.4% |
| QLFS2009Q4 | 2,130 | 2,032 | 22.8% | 26.0% |

Source: Own calculations using OHS, LFS and QLFS data.

Figure 16: Narrow unemployment rates by gender, 1995-2009
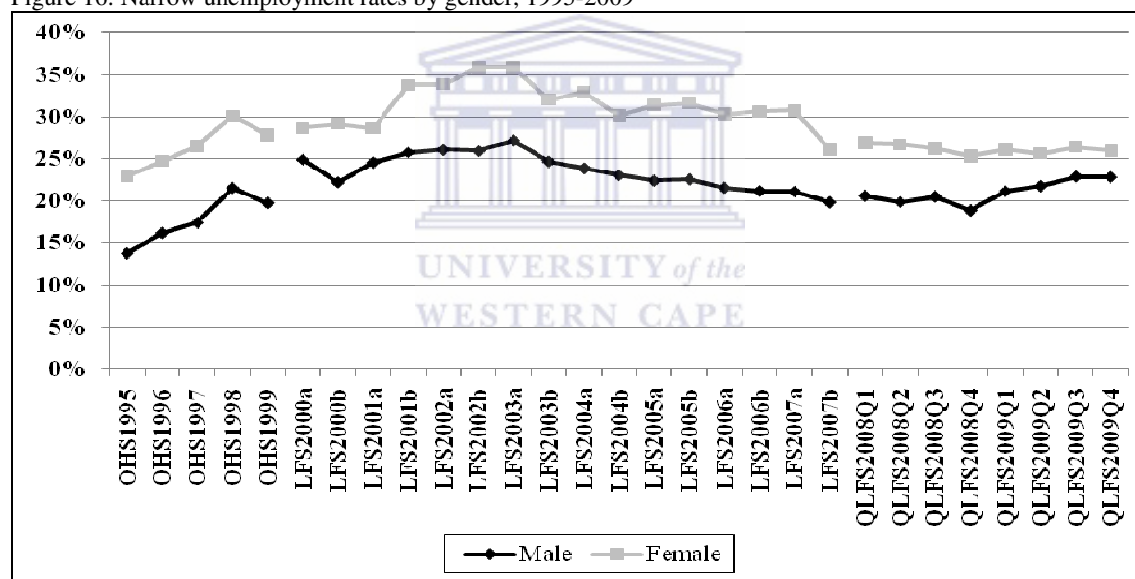


Source: Own calculations using OHS, LFS and QLFS data.

The remainder of Section 3.5 investigates unemployment rates by various demographic characteristics. First, Table 26 shows similar results as Hlekiso and Mahlo's findings (2009) that unemployment rates were higher in Africans and Coloureds. Compared to their male counterparts, women of all races recorded higher unemployment rates. In addition, African women recorded the highest unemployment rates throughout the entire study period. The African female unemployment rate exhibited an upward trend for most parts of the years, peaking at 42.3% in LFS2002b. In contrast, the White unemployment rates were the lowest (about 4% in males and 6% in females, during the period under study).

Table 26: Narrow unemployment rates by gender and race, 1995-2009

| | Male | | | | Female | | | |
|---|---|---|---|---|---|---|---|---|
| | **African** | **Coloured** | **Indian** | **White** | **African** | **Coloured** | **Indian** | **White** |
| OHS1995 | 16.8% | 13.3% | 8.8% | 3.1% | 28.3% | 19.2% | 14.1% | 5.1% |
| OHS1996 | 21.3% | 9.8% | 9.0% | 3.3% | 32.5% | 14.4% | 13.7% | 4.3% |
| OHS1997 | 22.3% | 12.9% | 8.4% | 2.9% | 33.7% | 18.3% | 12.2% | 5.3% |
| OHS1998 | 27.3% | 13.5% | 13.6% | 3.9% | 38.3% | 18.7% | 16.9% | 5.0% |
| OHS1999 | 24.5% | 13.4% | 14.5% | 4.4% | 35.0% | 17.5% | 17.2% | 5.1% |
| LFS2000a | 30.0% | 19.5% | 16.7% | 5.9% | 33.2% | 21.4% | 24.8% | 7.9% |
| LFS2000b | 27.1% | 15.8% | 13.6% | 4.1% | 34.1% | 21.6% | 19.6% | 8.2% |
| LFS2001a | 29.4% | 19.9% | 14.4% | 6.0% | 33.0% | 22.8% | 20.5% | 8.2% |
| LFS2001b | 31.5% | 19.5% | 15.7% | 4.7% | 40.7% | 23.1% | 23.5% | 7.4% |
| LFS2002a | 31.4% | 21.4% | 17.5% | 5.0% | 39.5% | 27.2% | 24.0% | 8.6% |
| LFS2002b | 31.5% | 19.9% | 15.6% | 5.0% | 42.3% | 26.6% | 27.1% | 7.4% |
| LFS2003a | 32.8% | 20.2% | 18.3% | 5.6% | 42.6% | 24.7% | 28.7% | 7.7% |
| LFS2003b | 30.0% | 18.8% | 15.5% | 4.0% | 38.7% | 23.6% | 18.4% | 6.2% |
| LFS2004a | 29.4% | 16.2% | 14.0% | 3.9% | 39.9% | 20.2% | 21.0% | 6.3% |
| LFS2004b | 27.6% | 19.7% | 12.4% | 5.1% | 36.0% | 24.1% | 15.4% | 5.8% |
| LFS2005a | 26.7% | 18.6% | 15.4% | 4.4% | 37.6% | 21.2% | 22.6% | 5.9% |
| LFS2005b | 26.6% | 20.6% | 14.0% | 3.6% | 37.1% | 24.6% | 18.6% | 6.9% |
| LFS2006a | 25.8% | 18.3% | 11.8% | 3.6% | 36.2% | 19.6% | 10.2% | 6.2% |
| LFS2006b | 25.3% | 16.6% | 6.6% | 4.6% | 36.4% | 22.6% | 14.3% | 4.4% |
| LFS2007a | 25.0% | 16.9% | 11.3% | 4.1% | 36.4% | 22.9% | 17.9% | 4.6% |
| LFS2007b | 23.3% | 20.0% | 7.4% | 3.5% | 30.9% | 21.3% | 10.2% | 4.2% |
| QLFS2008Q1 | 24.4% | 18.0% | 9.8% | 4.1% | 31.5% | 20.4% | 15.0% | 6.7% |
| QLFS2008Q2 | 23.4% | 17.9% | 10.8% | 3.6% | 31.1% | 21.3% | 15.7% | 5.8% |
| QLFS2008Q3 | 24.2% | 18.8% | 9.9% | 3.6% | 30.9% | 19.5% | 14.7% | 4.9% |
| QLFS2008Q4 | 22.4% | 16.7% | 10.3% | 2.5% | 29.9% | 19.4% | 14.0% | 3.6% |
| QLFS2009Q1 | 24.8% | 20.1% | 12.6% | 3.5% | 30.9% | 18.7% | 13.0% | 5.8% |
| QLFS2009Q2 | 25.8% | 18.5% | 11.5% | 4.4% | 30.2% | 20.7% | 11.3% | 4.8% |
| QLFS2009Q3 | 27.0% | 20.6% | 11.7% | 4.3% | 30.7% | 22.8% | 14.5% | 5.5% |
| QLFS2009Q4 | 27.1% | 19.6% | 11.9% | 4.2% | 30.4% | 22.2% | 9.6% | 5.7% |

Source: Own calculations using OHS, LFS and QLFS data.

Unemployment rates by age categories in each gender are presented in Table 27. The male unemployment rates were always lower than the females in all age categories. Also, unemployment rates were higher in the younger age (15-34 years old) categories in both genders. These findings are similar to those of Mlatsheni and Rospabe (2002), Kingdon and Knight (2004) and Bhorat (2009). However, it should be noted that individuals in this category might be unemployable due to lack of work experience. The unemployment rates were lowest in the 55-65 years category in both genders during the entire period under investigation. This implies that the labour market demands for more experienced workers.

Table 27: Narrow unemployment rates by gender and age category, 1995-2009

| | Male | | | | | Female | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | 15-24 years | 25-34 years | 35-44 years | 45-54 years | 55-65 years | 15-24 years | 25-34 years | 35-44 years | 45-54 years | 55-65 years |
| OHS1995 | 31.3% | 15.6% | 8.8% | 6.3% | 5.8% | 42.5% | 25.9% | 15.1% | 12.6% | 6.7% |
| OHS1996 | 31.7% | 16.9% | 12.7% | 10.8% | 7.9% | 40.8% | 29.7% | 17.4% | 13.3% | 10.2% |
| OHS1997 | 36.7% | 20.0% | 11.8% | 9.9% | 7.8% | 43.9% | 32.1% | 19.9% | 14.0% | 5.9% |
| OHS1998 | 41.3% | 24.5% | 14.8% | 12.2% | 10.0% | 49.5% | 35.9% | 20.9% | 16.5% | 9.7% |
| OHS1999 | 38.4% | 22.5% | 13.6% | 10.5% | 7.9% | 46.8% | 32.3% | 21.1% | 12.2% | 5.9% |
| LFS2000a | 42.1% | 28.9% | 17.1% | 13.1% | 8.2% | 46.7% | 36.0% | 20.0% | 13.8% | 6.2% |
| LFS2000b | 42.3% | 24.8% | 15.5% | 11.9% | 7.1% | 51.9% | 36.0% | 20.4% | 12.7% | 6.4% |
| LFS2001a | 47.7% | 27.1% | 16.3% | 12.9% | 8.7% | 51.6% | 35.9% | 19.0% | 12.4% | 5.6% |
| LFS2001b | 49.0% | 29.2% | 17.7% | 12.3% | 10.9% | 58.4% | 40.4% | 22.3% | 16.0% | 10.1% |
| LFS2002a | 50.7% | 28.3% | 16.9% | 14.2% | 10.6% | 57.5% | 40.5% | 23.8% | 16.7% | 7.0% |
| LFS2002b | 50.3% | 27.3% | 17.4% | 15.7% | 11.1% | 62.4% | 42.4% | 25.2% | 16.7% | 8.3% |
| LFS2003a | 54.6% | 29.0% | 17.7% | 14.7% | 11.5% | 64.2% | 41.6% | 24.4% | 17.2% | 9.2% |
| LFS2003b | 52.3% | 25.5% | 15.7% | 13.4% | 11.0% | 58.8% | 37.7% | 22.4% | 13.6% | 5.6% |
| LFS2004a | 50.1% | 25.8% | 15.1% | 13.3% | 8.8% | 61.3% | 38.3% | 21.9% | 14.2% | 6.3% |
| LFS2004b | 45.4% | 25.6% | 15.5% | 12.1% | 7.9% | 59.3% | 35.3% | 21.2% | 11.6% | 6.2% |
| LFS2005a | 47.3% | 25.2% | 13.5% | 11.0% | 9.2% | 58.8% | 38.2% | 21.5% | 12.9% | 6.2% |
| LFS2005b | 45.9% | 24.3% | 15.0% | 11.2% | 9.5% | 57.9% | 37.5% | 22.0% | 15.0% | 6.4% |
| LFS2006a | 44.9% | 24.5% | 12.7% | 10.3% | 7.1% | 56.4% | 35.4% | 22.5% | 13.4% | 4.2% |
| LFS2006b | 44.4% | 22.5% | 14.1% | 10.6% | 8.5% | 57.0% | 35.5% | 23.0% | 14.4% | 4.7% |
| LFS2007a | 44.3% | 22.9% | 12.6% | 10.6% | 7.6% | 59.4% | 35.9% | 21.7% | 14.2% | 5.3% |
| LFS2007b | 43.3% | 21.0% | 12.2% | 10.2% | 7.0% | 51.2% | 31.1% | 17.3% | 12.2% | 5.8% |
| QLFS2008Q1 | 42.7% | 21.6% | 12.7% | 10.8% | 9.5% | 50.2% | 32.2% | 20.1% | 10.5% | 5.1% |
| QLFS2008Q2 | 41.1% | 21.7% | 11.9% | 9.3% | 9.3% | 48.7% | 32.4% | 20.1% | 10.8% | 5.5% |
| QLFS2008Q3 | 42.2% | 21.7% | 14.0% | 10.2% | 8.0% | 52.0% | 31.4% | 19.5% | 8.1% | 4.5% |
| QLFS2008Q4 | 39.8% | 20.0% | 12.1% | 10.7% | 5.8% | 51.0% | 31.1% | 17.2% | 8.3% | 4.3% |
| QLFS2009Q1 | 43.9% | 23.3% | 13.0% | 11.0% | 7.1% | 52.7% | 32.7% | 17.8% | 8.3% | 4.1% |
| QLFS2009Q2 | 44.7% | 23.8% | 14.5% | 11.6% | 6.5% | 52.3% | 31.4% | 17.0% | 10.2% | 3.6% |
| QLFS2009Q3 | 44.9% | 26.0% | 16.0% | 11.9% | 8.1% | 52.5% | 32.0% | 18.7% | 11.6% | 4.8% |
| QLFS2009Q4 | 44.9% | 26.2% | 16.1% | 10.9% | 7.4% | 52.5% | 31.2% | 18.2% | 10.7% | 5.6% |

Source: Own calculations using OHS, LFS and QLFS data.

Table 28 shows that during the OHS years, individuals with no schooling as well as those with at least Matric recorded the lowest unemployment rates. This is because those with no education might have no incentive to participate in the labour market, while those with at least Matric confirm a negative relationship between education attainment and unemployment. This is further evidenced by high unemployment rates of individuals with incomplete primary education compared to unemployment rates of degree holders. During the LFS years, Individuals with incomplete secondary education recorded the highest unemployment rates. The QLFSs show that in all educational categories, male unemployment rates increased, as a result of the global economic recession that occurred during this period.

Table 28: Narrow male unemployment rates in each educational attainment category, 1995-2009

|  | No Schooling | Incomplete primary | Incomplete secondary | Matric | Matric + Cert/Dip | Degree |
|---|---|---|---|---|---|---|
| OHS1995 | 9.8% | 15.3% | 16.9% | 13.3% | 4.7% | 2.4% |
| OHS1996 | 14.9% | 22.7% | 19.1% | 13.0% | 2.9% | 2.6% |
| OHS1997 | 14.5% | 21.6% | 20.2% | 16.8% | 6.0% | 3.1% |
| OHS1998 | 16.9% | 25.2% | 25.4% | 21.0% | 7.4% | 3.2% |
| OHS1999 | 13.4% | 21.7% | 23.7% | 20.1% | 11.3% | 4.2% |
| LFS2000a | 14.9% | 25.1% | 28.4% | 27.9% | 14.3% | 6.7% |
| LFS2000b | 15.7% | 22.9% | 26.1% | 24.5% | 12.3% | 3.9% |
| LFS2001a | 15.6% | 24.5% | 28.6% | 27.7% | 12.4% | 5.7% |
| LFS2001b | 18.0% | 26.2% | 31.4% | 26.1% | 11.7% | 5.2% |
| LFS2002a | 15.7% | 25.6% | 32.1% | 27.6% | 12.5% | 4.1% |
| LFS2002b | 17.6% | 28.3% | 31.3% | 26.2% | 11.8% | 4.3% |
| LFS2003a | 18.7% | 26.3% | 32.8% | 29.1% | 12.0% | 6.0% |
| LFS2003b | 17.6% | 25.6% | 30.2% | 24.6% | 12.1% | 3.1% |
| LFS2004a | 13.2% | 21.6% | 29.2% | 25.8% | 9.7% | 5.3% |
| LFS2004b | 13.2% | 23.8% | 28.9% | 23.2% | 8.7% | 3.1% |
| LFS2005a | 16.5% | 22.2% | 27.6% | 22.9% | 8.6% | 3.2% |
| LFS2005b | 15.7% | 23.5% | 27.3% | 23.0% | 8.0% | 3.9% |
| LFS2006a | 17.2% | 20.9% | 26.4% | 21.6% | 10.0% | 4.5% |
| LFS2006b | 17.7% | 22.0% | 25.9% | 21.2% | 7.2% | 4.4% |
| LFS2007a | 13.7% | 20.2% | 26.5% | 21.2% | 7.1% | 2.0% |
| LFS2007b | 12.0% | 21.8% | 25.2% | 19.9% | 8.6% | 2.0% |
| QLFS2008Q1 | 15.8% | 21.8% | 25.2% | 20.2% | 8.6% | 5.5% |
| QLFS2008Q2 | 16.4% | 20.6% | 24.5% | 19.8% | 8.5% | 3.2% |
| QLFS2008Q3 | 13.0% | 22.7% | 25.3% | 20.4% | 8.1% | 3.2% |
| QLFS2008Q4 | 10.3% | 20.7% | 23.8% | 18.9% | 5.8% | 2.3% |
| QLFS2009Q1 | 15.6% | 19.8% | 26.7% | 21.5% | 8.7% | 2.5% |
| QLFS2009Q2 | 16.3% | 24.3% | 26.0% | 22.8% | 8.5% | 3.6% |
| QLFS2009Q3 | 15.9% | 26.0% | 28.5% | 22.4% | 9.5% | 4.5% |
| QLFS2009Q4 | 16.2% | 24.5% | 28.5% | 22.8% | 8.7% | 3.7% |

Source: Own calculations using OHS, LFS and QLFS data.

On the other hand, Table 29 presents the female educational attainment unemployment rates, and it can be seen that unemployment rate was also the highest for people with incomplete secondary education. In addition, unemployment rates of females with Matric and post-Matric certificate/diploma were higher, when compared with males having the same qualifications. Finally, unemployment rates in all education categories showed an upward trend in the QLFSs, once again as a result of the impact of the global recession.

Table 29: Narrow female unemployment in each educational attainment category, 1995-2009

| | No Schooling | Incomplete primary | Incomplete secondary | Matric | Matric + Cert/Dip | Degree |
|---|---|---|---|---|---|---|
| OHS1995 | 23.5% | 26.2% | 27.6% | 22.7% | 6.1% | 2.8% |
| OHS1996 | 25.2% | 29.6% | 30.6% | 22.6% | 5.1% | 4.1% |
| OHS1997 | 24.7% | 31.2% | 30.8% | 26.5% | 9.4% | 5.4% |
| OHS1998 | 25.9% | 32.3% | 37.2% | 28.8% | 13.2% | 5.9% |
| OHS1999 | 21.7% | 27.3% | 34.4% | 29.9% | 12.3% | 5.3% |
| LFS2000a | 16.6% | 23.5% | 33.8% | 35.3% | 19.3% | 8.1% |
| LFS2000b | 18.6% | 25.3% | 34.9% | 36.3% | 16.5% | 5.9% |
| LFS2001a | 14.8% | 23.6% | 34.1% | 36.0% | 15.0% | 8.7% |
| LFS2001b | 25.8% | 31.0% | 41.1% | 36.4% | 17.8% | 8.6% |
| LFS2002a | 19.5% | 28.1% | 40.9% | 38.7% | 20.3% | 9.2% |
| LFS2002b | 21.7% | 32.2% | 44.4% | 39.0% | 16.6% | 8.7% |
| LFS2003a | 24.0% | 31.6% | 43.5% | 40.4% | 17.0% | 7.7% |
| LFS2003b | 18.2% | 28.2% | 40.4% | 35.2% | 14.7% | 4.9% |
| LFS2004a | 16.2% | 27.0% | 41.0% | 38.5% | 13.2% | 5.8% |
| LFS2004b | 17.0% | 27.6% | 37.9% | 33.3% | 11.1% | 3.3% |
| LFS2005a | 19.8% | 27.7% | 39.4% | 33.8% | 14.0% | 3.4% |
| LFS2005b | 20.7% | 30.2% | 39.0% | 34.1% | 12.9% | 3.6% |
| LFS2006a | 22.5% | 24.9% | 37.2% | 33.5% | 15.1% | 2.8% |
| LFS2006b | 20.8% | 26.6% | 37.9% | 33.2% | 13.3% | 2.8% |
| LFS2007a | 20.6% | 25.7% | 38.4% | 33.5% | 12.2% | 6.8% |
| LFS2007b | 13.2% | 23.9% | 34.7% | 27.0% | 11.9% | 3.0% |
| QLFS2008Q1 | 15.4% | 23.8% | 33.8% | 29.1% | 12.2% | 4.9% |
| QLFS2008Q2 | 15.7% | 22.5% | 33.6% | 29.1% | 11.9% | 3.4% |
| QLFS2008Q3 | 14.7% | 19.7% | 33.8% | 28.7% | 12.6% | 3.2% |
| QLFS2008Q4 | 15.1% | 21.0% | 31.6% | 28.6% | 11.4% | 3.2% |
| QLFS2009Q1 | 14.1% | 18.7% | 33.1% | 29.8% | 12.1% | 4.7% |
| QLFS2009Q2 | 15.8% | 21.8% | 31.7% | 29.0% | 11.7% | 4.2% |
| QLFS2009Q3 | 17.0% | 21.2% | 33.5% | 29.3% | 13.0% | 3.8% |
| QLFS2009Q4 | 19.2% | 21.0% | 31.8% | 29.1% | 12.8% | 5.3% |

Source: Own calculations using OHS, LFS and QLFS data.

The provincial unemployment rates in each gender are shown in Tables 30 and 31. In line with the findings of recent studies (e.g., Altman 2003, Hlekiso and Mahlo 2009), during the period under study, female unemployment rates were always higher than those of males in all provinces. Limpopo and Eastern Cape provinces had the highest unemployment rates for both genders, while the opposite took place in Western Cape and Gauteng.

Table 30: Male narrow unemployment rates in each province, 1995-2009

| | WC | EC | NC | FS | KZN | NW | GAU | MPU | LIM |
|---|---|---|---|---|---|---|---|---|---|
| OHS1995 | 10.8% | 21.3% | 13.9% | 8.8% | 16.7% | 13.6% | 12.9% | 10.9% | 12.7% |
| OHS1996 | 9.1% | 25.7% | 10.9% | 18.1% | 19.7% | 12.4% | 15.1% | 9.7% | 23.7% |
| OHS1997 | 9.0% | 26.5% | 13.6% | 14.0% | 20.0% | 16.6% | 17.8% | 16.2% | 22.5% |
| OHS1998 | 11.2% | 33.8% | 13.3% | 15.9% | 24.7% | 21.8% | 20.1% | 19.6% | 32.3% |
| OHS1999 | 12.7% | 29.1% | 12.3% | 19.8% | 22.5% | 18.9% | 16.8% | 18.8% | 28.8% |
| LFS2000a | 16.9% | 25.2% | 20.9% | 19.0% | 30.1% | 28.4% | 24.9% | 25.1% | 27.8% |
| LFS2000b | 14.7% | 24.6% | 15.0% | 19.7% | 27.4% | 23.7% | 21.3% | 20.3% | 25.9% |
| LFS2001a | 18.4% | 30.4% | 18.1% | 22.8% | 27.1% | 23.1% | 24.4% | 22.5% | 27.9% |
| LFS2001b | 15.5% | 30.0% | 20.6% | 22.1% | 31.5% | 21.9% | 26.6% | 23.7% | 30.7% |

Table 30: Continued

|  | WC | EC | NC | FS | KZN | NW | GAU | MPU | LIM |
|---|---|---|---|---|---|---|---|---|---|
| LFS2002a | 15.6% | 26.5% | 21.7% | 25.1% | 33.9% | 23.7% | 25.9% | 23.4% | 31.6% |
| LFS2002b | 16.4% | 31.4% | 17.3% | 23.6% | 31.9% | 24.1% | 25.6% | 24.8% | 28.4% |
| LFS2003a | 17.7% | 28.0% | 21.0% | 25.8% | 34.1% | 25.2% | 26.1% | 26.5% | 35.2% |
| LFS2003b | 18.0% | 29.5% | 20.9% | 22.5% | 28.2% | 25.0% | 24.1% | 22.1% | 28.7% |
| LFS2004a | 15.5% | 30.7% | 18.7% | 19.8% | 29.4% | 25.2% | 22.9% | 20.5% | 27.9% |
| LFS2004b | 17.0% | 27.7% | 19.4% | 24.7% | 26.5% | 24.7% | 21.9% | 20.3% | 23.3% |
| LFS2005a | 15.6% | 26.7% | 23.0% | 22.8% | 27.8% | 23.3% | 18.1% | 22.2% | 29.8% |
| LFS2005b | 16.9% | 28.4% | 18.8% | 24.3% | 30.0% | 22.9% | 17.6% | 21.3% | 24.4% |
| LFS2006a | 14.9% | 21.2% | 19.6% | 19.8% | 27.0% | 25.2% | 19.2% | 20.7% | 29.7% |
| LFS2006b | 13.1% | 29.7% | 23.0% | 20.6% | 24.5% | 24.1% | 17.9% | 20.1% | 26.1% |
| LFS2007a | 15.6% | 22.8% | 20.1% | 19.4% | 26.7% | 25.6% | 17.1% | 20.5% | 27.3% |
| LFS2007b | 14.3% | 24.1% | 19.8% | 20.0% | 28.7% | 20.2% | 15.6% | 15.0% | 24.0% |
| QLFS2008Q1 | 16.0% | 27.7% | 20.5% | 20.5% | 20.8% | 18.9% | 18.9% | 20.5% | 28.4% |
| QLFS2008Q2 | 16.4% | 23.2% | 19.8% | 19.2% | 21.1% | 20.7% | 17.7% | 20.4% | 27.5% |
| QLFS2008Q3 | 17.7% | 26.5% | 16.5% | 18.7% | 20.4% | 24.0% | 18.2% | 21.5% | 27.0% |
| QLFS2008Q4 | 14.8% | 22.9% | 16.1% | 18.9% | 19.0% | 21.8% | 17.3% | 19.6% | 24.9% |
| QLFS2009Q1 | 16.5% | 26.1% | 22.6% | 21.7% | 21.4% | 24.5% | 18.8% | 22.5% | 27.6% |
| QLFS2009Q2 | 19.1% | 25.4% | 21.9% | 23.1% | 19.8% | 23.5% | 21.0% | 24.6% | 24.2% |
| QLFS2009Q3 | 21.5% | 26.2% | 27.4% | 25.6% | 18.5% | 24.4% | 23.0% | 24.9% | 24.4% |
| QLFS2009Q4 | 20.5% | 27.8% | 22.5% | 21.3% | 19.6% | 24.2% | 23.4% | 24.8% | 24.5% |

Source: Own calculations using OHS, LFS and QLFS data.

Table 31: Narrow female unemployment rates in each province, 1995-2009

|  | WC | EC | NC | FS | KZN | NW | GAU | MPU | LIM |
|---|---|---|---|---|---|---|---|---|---|
| OHS1995 | 17.7% | 27.7% | 30.5% | 17.6% | 26.2% | 23.4% | 19.8% | 26.0% | 29.0% |
| OHS1996 | 13.7% | 31.7% | 14.3% | 22.7% | 29.5% | 21.8% | 24.4% | 20.6% | 36.0% |
| OHS1997 | 15.6% | 31.5% | 25.6% | 26.1% | 26.7% | 29.4% | 26.7% | 34.8% | 29.7% |
| OHS1998 | 16.8% | 40.2% | 24.5% | 29.2% | 30.5% | 33.8% | 27.5% | 32.4% | 39.7% |
| OHS1999 | 14.9% | 30.6% | 26.4% | 28.3% | 29.7% | 30.5% | 26.1% | 31.6% | 39.2% |
| LFS2000a | 21.3% | 22.7% | 25.6% | 27.1% | 31.5% | 35.1% | 34.1% | 33.7% | 22.9% |
| LFS2000b | 18.9% | 26.1% | 23.7% | 28.9% | 28.3% | 35.8% | 33.5% | 34.1% | 30.2% |
| LFS2001a | 19.7% | 26.4% | 32.0% | 33.5% | 25.2% | 34.5% | 33.5% | 30.6% | 28.3% |
| LFS2001b | 20.3% | 32.7% | 31.3% | 33.9% | 36.4% | 38.7% | 35.4% | 36.0% | 38.6% |
| LFS2002a | 21.9% | 26.3% | 36.6% | 38.6% | 38.1% | 40.3% | 35.0% | 37.9% | 38.3% |
| LFS2002b | 23.9% | 34.1% | 35.7% | 35.9% | 38.5% | 41.1% | 37.2% | 37.0% | 39.6% |
| LFS2003a | 22.6% | 31.5% | 39.3% | 38.3% | 38.7% | 43.4% | 37.0% | 36.2% | 43.2% |
| LFS2003b | 21.4% | 34.1% | 34.6% | 35.4% | 35.5% | 34.0% | 32.3% | 29.4% | 33.2% |
| LFS2004a | 18.6% | 34.6% | 27.7% | 34.0% | 37.0% | 39.5% | 34.0% | 32.4% | 34.1% |
| LFS2004b | 20.5% | 31.6% | 32.2% | 33.6% | 31.1% | 32.9% | 31.5% | 30.6% | 32.5% |
| LFS2005a | 20.2% | 27.4% | 37.9% | 39.7% | 36.2% | 36.1% | 29.0% | 34.1% | 35.2% |
| LFS2005b | 21.3% | 31.3% | 32.4% | 37.3% | 35.9% | 33.2% | 29.8% | 33.9% | 35.6% |
| LFS2006a | 17.2% | 23.0% | 28.8% | 38.1% | 33.0% | 40.7% | 29.0% | 35.4% | 41.5% |
| LFS2006b | 17.1% | 34.2% | 36.3% | 33.3% | 28.9% | 37.2% | 30.5% | 37.4% | 37.9% |
| LFS2007a | 18.9% | 28.3% | 35.3% | 34.6% | 32.0% | 40.4% | 30.3% | 33.2% | 37.2% |
| LFS2007b | 17.4% | 28.2% | 34.3% | 31.8% | 31.5% | 30.5% | 20.0% | 30.5% | 30.6% |
| QLFS2008Q1 | 20.5% | 28.4% | 30.3% | 30.0% | 24.8% | 27.1% | 27.3% | 27.5% | 34.7% |
| QLFS2008Q2 | 22.3% | 26.5% | 30.8% | 33.0% | 23.4% | 26.1% | 26.8% | 29.7% | 33.4% |
| QLFS2008Q3 | 22.1% | 28.3% | 30.4% | 27.8% | 23.7% | 30.3% | 26.3% | 25.0% | 31.9% |
| QLFS2008Q4 | 19.2% | 27.5% | 27.9% | 26.8% | 22.7% | 30.8% | 24.8% | 26.8% | 32.7% |
| QLFS2009Q1 | 20.5% | 30.7% | 32.9% | 29.7% | 23.8% | 30.0% | 25.4% | 27.1% | 28.6% |
| QLFS2009Q2 | 22.0% | 30.4% | 31.8% | 31.2% | 18.7% | 33.2% | 25.8% | 28.7% | 25.5% |
| QLFS2009Q3 | 23.6% | 27.3% | 32.8% | 32.0% | 18.9% | 33.0% | 29.2% | 26.4% | 26.7% |
| QLFS2009Q4 | 22.6% | 26.2% | 27.3% | 29.7% | 18.8% | 31.0% | 28.6% | 28.5% | 29.5% |

Source: Own calculations using OHS, LFS and QLFS data.

Finally, Table 32 shows that a higher proportion of male unemployed declared they have worked before, compared with female unemployed. In addition, for those who worked before, in both genders, the majority of them were previously involved in unskilled occupations in the primary sector, especially working as crafts and related trade workers.

Table 32: Percentage of narrow unemployed who worked before by gender, 1995-2009

|  | Male | | | Female | | |
|---|---|---|---|---|---|---|
|  | Yes | No | Total | Yes | No | Total |
| OHS1995 | 42.3% | 57.7% | 100.0% | 33.8% | 66.3% | 100.0% |
| OHS1996 | 43.1% | 56.9% | 100.0% | 32.1% | 67.9% | 100.0% |
| OHS1997 | 36.0% | 64.0% | 100.0% | 27.7% | 72.3% | 100.0% |
| OHS1998 | 44.0% | 56.0% | 100.0% | 33.7% | 66.3% | 100.0% |
| OHS1999 | 39.5% | 60.6% | 100.0% | 33.5% | 66.5% | 100.0% |
| LFS2000a | 53.3% | 46.7% | 100.0% | 47.5% | 52.6% | 100.0% |
| LFS2000b | 49.4% | 50.6% | 100.0% | 42.0% | 58.1% | 100.0% |
| LFS2001a | 49.6% | 50.4% | 100.0% | 42.2% | 57.8% | 100.0% |
| LFS2001b | 50.4% | 49.6% | 100.0% | 42.7% | 57.3% | 100.0% |
| LFS2002a | 48.5% | 51.6% | 100.0% | 43.0% | 57.0% | 100.0% |
| LFS2002b | 44.4% | 55.6% | 100.0% | 38.8% | 61.2% | 100.0% |
| LFS2003a | 45.3% | 54.7% | 100.0% | 39.9% | 60.1% | 100.0% |
| LFS2003b | 44.7% | 55.3% | 100.0% | 37.6% | 62.4% | 100.0% |
| LFS2004a | 44.5% | 55.5% | 100.0% | 36.8% | 63.2% | 100.0% |
| LFS2004b | 45.5% | 54.5% | 100.0% | 38.6% | 61.5% | 100.0% |
| LFS2005a | 45.6% | 54.4% | 100.0% | 39.2% | 60.8% | 100.0% |
| LFS2005b | 38.4% | 61.6% | 100.0% | 33.1% | 66.9% | 100.0% |
| LFS2006a | 40.7% | 59.3% | 100.0% | 37.3% | 62.7% | 100.0% |
| LFS2006b | 42.3% | 57.7% | 100.0% | 43.2% | 56.8% | 100.0% |
| LFS2007a | 38.9% | 61.1% | 100.0% | 43.2% | 56.8% | 100.0% |
| LFS2007b | 44.3% | 55.7% | 100.0% | 48.1% | 52.0% | 100.0% |
| QLFS2008Q1 | 64.3% | 35.7% | 100.0% | 56.0% | 44.0% | 100.0% |
| QLFS2008Q2 | 63.6% | 36.4% | 100.0% | 55.7% | 44.4% | 100.0% |
| QLFS2008Q3 | 63.9% | 36.1% | 100.0% | 54.8% | 45.2% | 100.0% |
| QLFS2008Q4 | 63.2% | 36.8% | 100.0% | 54.6% | 45.4% | 100.0% |
| QLFS2009Q1 | 64.0% | 36.0% | 100.0% | 54.5% | 45.5% | 100.0% |
| QLFS2009Q2 | 64.7% | 35.3% | 100.0% | 56.4% | 43.6% | 100.0% |
| QLFS2009Q3 | 66.0% | 34.0% | 100.0% | 58.2% | 41.8% | 100.0% |
| QLFS2009Q4 | 65.0% | 35.1% | 100.0% | 55.0% | 45.0% | 100.0% |

Source: Own calculations using OHS, LFS and QLFS data.

## 3.6 Conclusion

This chapter investigated trends on labour force participation, employment, earnings of employed and unemployment by gender using all labour surveys since 1995. It was found that there was no indication of feminization of both labour force and employment, as the males are still more likely to participate in the labour market and be employed. However, the gap between male and female unemployment rates did narrow in 2009.

# CHAPTER 4: MULTIVARIATE ANALYSES ON LABOUR FORCE PARTICIPATION, EMPLOYMENT AND EARNINGS

## 4.1    Introduction

The analyses in Chapter 3, although important and useful, are limited in that only one or two variables were taken into account when describing labour force participation, employment or unemployment. A wide variety of variables could account for the likelihood of participation and employment, as well as earnings. Hence, the purpose of this chapter is to investigate the role of various explanatory variables in influencing whether or not an individual participates in the labour force, is employed, as well as his/her hourly wage.

Furthermore, in an effort to avoid selection bias[27] on the simple employment and earnings, regression, a two-step and three-step Heckman methods are applied respectively. Firstly, participation probit is estimated, and estimates from this equation are used to derive an inverse Mills ratio (i.e. the lambda). This lambda is therefore included in the second equation (i.e. employment probit). In this regard, this makes the multivariate analyses conducted to examine the determinants of employment likelihood to be conditional on participation. Secondly, the estimates resulting from the aforementioned employment probit are used to estimate the next inverse Mills ratio to be used in the earnings probit. This further makes the earnings equation to be conditional on both participation and employment.

Section 4.2 presents the probit on labour force participation while Section 4.3 and Section 4.4 discuss the two-step Heckprobit on employment and the three-step Heckprobit on real hourly wage respectively.

## 4.2    Multivariate analyses on labour force participation likelihood

The following explanatory variables are used to conduct a probit[28] on the narrow labour force participation:

•      Age category dummy variables (Reference group: 25-34 years)

•      Race dummy variables (Reference group: White)

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[27] "Bias that results from using non-randomly selected   samples   to estimate behavioral relationship as an ordinary specification  bias that arises because of a missing data problem"( Heckman, 1979)

[28] This is where the dependent variable is a binary variable, i.e. either one or zero.

- Gender dummy variable (Reference group: Female)

- Province dummy variables (Reference group: Eastern Cape)

- Educational attainment spline variables: No education to Grade 6 (incomplete primary), Grade 7 to Grade 11 (incomplete secondary)[29]

- Educational attainment dummy variables: Matric, Matric plus Certificate or Diploma, Degree or above

- Household headship dummy variable (Reference group: Not household head)

- Marital status dummy variable (Reference group: unmarried/divorced/widowed)

- Number of children age 0-14 years in the household

- Number of male aged 15-59 years in the household

- Number of females aged 15-59 years in the household

- Number of elderly aged 60 years or above in the house

Table 33 presents the participation probit regression results in the labour market for selected surveys[30]. The table reports marginal fixed effects[31] as opposed to coefficients. All the independent variables were statistically significant at 1%. Looking at the age dummy variables, it is evident that individuals in the 35-44 year age cohort were more likely to participate in the labour market compared to the reference group (25-34 years). The 15-24, 45-54, and the 55-65 years age cohorts were less likely to participate compared to the reference group. This may be due to the fact that the 15-24 age cohorts are expected to be in learning institution while some of the people in the older age cohorts (i.e. 45-54 years and the 55-65 years) might have retired early.

The race dummy indicates that even though all races were more likely to participate compared to Whites, the Indian dummy variable is negative in LFS2006b and QLFS2009Q4, implying less likelihood of participation. Individuals from all the provinces, except people from the Limpopo province were more likely to participate in the labour market compared to the Eastern Cape.

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[29] The maximum values of these two spline variables are six and five respectively. For instance, someone who completed Grade 5 only would have the primary spline variable value being five and the secondary spline variable value being zero. On the other hand, someone who completed Grade 9 had the two values being six and three respectively.

[30] The regression results in all surveys are presented in Table A.1 in the Appendix.

[31] Also known as partial changes, rather than reporting coefficients, it reports the change in the probability for an infinitesimal change in each independent, continuous variable and, by default, the discrete change in the probability for dummy variables.

Table 33: Probit regressions on narrow labour force participation likelihood, selected surveys

| | OHS1995 | | OHS1999 | | LFS2003b | | LFS2006b | | QLFS2009Q4 | |
|---|---|---|---|---|---|---|---|---|---|---|
| | Marginal fixed effects | x-bar | Marginal fixed effects | x-bar | Marginal fixed effects | x-bar | Marginal fixed effects | x-bar | Marginal fixed effects | x-bar |
| Age: 15-24 years | -0.347 | 0.339 | -0.360 | 0.342 | -0.344 | 0.326 | -0.352 | 0.320 | -0.401 | 0.323 |
| Age: 35-44 years | 0.006 | 0.191 | 0.023 | 0.191 | 0.004 | 0.179 | 0.014 | 0.176 | 0.017 | 0.181 |
| Age: 45-54 years | -0.119 | 0.114 | -0.111 | 0.114 | -0.104 | 0.131 | -0.086 | 0.134 | -0.071 | 0.134 |
| Age: 55-65 years | -0.378 | 0.091 | -0.375 | 0.086 | -0.366 | 0.096 | -0.347 | 0.099 | -0.337 | 0.098 |
| Race: African | 0.012 | 0.749 | -0.011 | 0.761 | 0.090 | 0.771 | 0.101 | 0.778 | 0.074 | 0.777 |
| Race: Coloured | 0.140 | 0.094 | 0.103 | 0.092 | 0.136 | 0.090 | 0.131 | 0.091 | 0.117 | 0.096 |
| Race: Indian | 0.042 | 0.030 | 0.015 | 0.029 | 0.034 | 0.029 | -0.013 | 0.028 | -0.028 | 0.029 |
| *Gender: Male* | *0.161* | *0.477* | *0.129* | *0.478* | *0.131* | *0.483* | *0.112* | *0.484* | *0.168* | *0.476* |
| Province: WC | 0.171 | 0.106 | 0.164 | 0.103 | 0.132 | 0.105 | 0.062 | 0.107 | 0.156 | 0.112 |
| Province: NC | 0.099 | 0.021 | 0.081 | 0.021 | 0.046 | 0.019 | 0.037 | 0.024 | 0.082 | 0.023 |
| Province: FS | 0.126 | 0.068 | 0.097 | 0.069 | 0.078 | 0.067 | -0.036 | 0.064 | 0.104 | 0.060 |
| Province: KZN | 0.089 | 0.202 | 0.095 | 0.202 | 0.056 | 0.205 | 0.003 | 0.205 | 0.012 | 0.205 |
| Province: NW | 0.080 | 0.083 | 0.047 | 0.083 | 0.008 | 0.082 | -0.051 | 0.072 | 0.016 | 0.070 |
| Province: GAU | 0.195 | 0.209 | 0.126 | 0.208 | 0.113 | 0.210 | 0.072 | 0.223 | 0.166 | 0.229 |
| Province: MPU | 0.072 | 0.067 | 0.102 | 0.068 | 0.060 | 0.067 | 0.026 | 0.073 | 0.098 | 0.070 |
| Province: LIM | -0.084 | 0.103 | -0.002 | 0.106 | 0.080 | 0.106 | -0.170 | 0.101 | -0.035 | 0.100 |
| Education: Primary | 0.008 | 5.214 | 0.006 | 5.224 | 0.011 | 5.343 | 0.005 | 5.425 | 0.006 | 5.551 |
| Education: Secondary | -0.007 | 2.740 | 0.006 | 2.718 | 0.011 | 2.925 | 0.020 | 3.126 | 0.030 | 3.354 |
| Education: Matric | 0.205 | 0.172 | 0.187 | 0.185 | 0.186 | 0.211 | 0.155 | 0.225 | 0.184 | 0.239 |
| Education: Matric + Certificate/Diploma | 0.305 | 0.050 | 0.317 | 0.039 | 0.321 | 0.046 | 0.266 | 0.053 | 0.283 | 0.062 |
| Education: Degree | 0.285 | 0.023 | 0.279 | 0.032 | 0.304 | 0.032 | 0.251 | 0.030 | 0.322 | 0.034 |
| Household head | 0.299 | 0.303 | 0.252 | 0.339 | 0.227 | 0.373 | 0.220 | 0.375 | 0.194 | 0.371 |
| Marital Status: Married | 0.091 | 0.434 | 0.067 | 0.402 | 0.074 | 0.401 | 0.089 | 0.385 | 0.054 | 0.370 |
| No. of children age 0-14 years in the hhold | -0.016 | 1.705 | -0.022 | 1.718 | -0.028 | 1.602 | -0.017 | 1.528 | -0.026 | 1.557 |
| No. of male aged 15-59 years in the hhold | -0.006 | 1.668 | -0.003 | 1.544 | 0.000 | 1.490 | 0.002 | 1.471 | 0.000 | 1.476 |
| No. of females aged 15-59 years in the hhold | 0.008 | 1.887 | 0.016 | 1.755 | 0.009 | 1.633 | 0.007 | 1.608 | 0.025 | 1.655 |
| No. of elderly aged 60+ years in the hhold | -0.033 | 0.356 | -0.046 | 0.322 | -0.058 | 0.300 | -0.043 | 0.290 | -0.045 | 0.273 |
| | | | | | | | | | | |
| Observed probability | 0.582 | | 0.594 | | 0.641 | | 0.629 | | 0.626 | |
| Predicted probability | 0.479 | | 0.522 | | 0.570 | | 0.599 | | 0.567 | |
| Number observed (weighted) | 23,968,482 | | 25,800,072 | | 28,738,730 | | 29,764,915 | | 31,134,894 | |
| Chi$^2$ | 8,777,258 | | 8,701,873 | | 9,697,715 | | 9,467,794 | | 1.15E+07 | |
| Pseudo R$^2$ | 0.265 | | 0.243 | | 0.245 | | 0.233 | | 0.268 | |

All explanatory variables are statistically significant at 1%.

The education splines show more likelihood of participation for individuals of all educational backgrounds except for those with incomplete secondary schooling. The less likelihood of participation in the labour market by individuals with incomplete secondary education is unexpected. The post-Matric and the degree holders show greater marginal fixed effects, indicating higher chances of participation compared to other education splines.

Being a married household head increase the probability of participation. This is due to the roles and social responsibilities associated with these categories. In addition, the number of children below the age of 15 as well the number of males whose age range between 15 and 59 years in a household have a negative impact on one's probability of participation in the labour market. This is because individuals might be lazy to look for work if there are many young males who would probably search for work, or some household members (especially females) might decide to stay at home and look after children and not enter the labour market for work. Interestingly, the greater the number of elderly aged 60 years and above a household, the lower the likelihood of participation in the labour market. This can be associated with heavy reliance on social grants that accrues to the elderly by other household members. Lastly, those from households that have more female members aged 15-59 years are more likely to participate in the labour market.
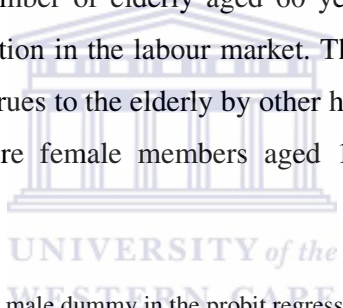
Figure 17: Marginal fixed effects of the male dummy in the probit regressions on narrow labour force participation, 1995-2009
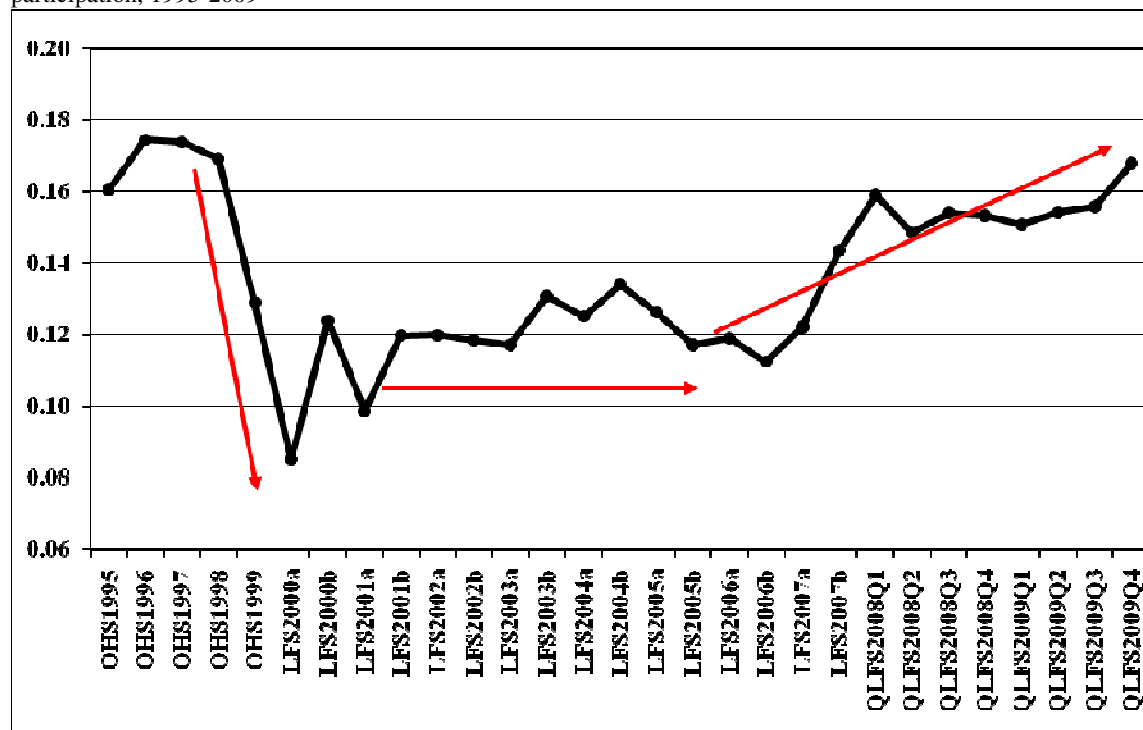


Source: Own calculations using OHS, LFS and QLFS data.

Figure 17 above presents the marginal fixed effects of the male dummy from all the probit regressions between 1995 and 2009 in an attempt to find out whether feminization of the LF occurred. The marginal fixed effect was always positive during the period under investigation, indicating no traces of feminization in labour force participation. However, there was downward trend in marginal effects during the OHS years, while the marginal fixed effects in the LFS years were more stabilized. Furthermore, a clear upward trend was recorded since the LFS2006a.

## 4.3    Multivariate analyses on employment likelihood

In the two-step Heckprobit regressions on employment likelihood, all the independent variables used in the participation probit regressions were included, except the four household member composition variables. Table 34 presents the results in selected surveys[32].

All independent variables were statistically significant at the 1% level of significance, including the lambda. This implies that sample selection bias is present, and running a simple one-step probit on employment likelihood will lead to misleading results. Individuals aged at least 35 years were more likely to be employed compared to the reference group (25-34 years). This complements the findings on the youth unemployment problem (Table 27).

Africans, followed by Coloureds and Indians were less likely to be employed, compared with Whites. Table 34 also shows that individuals from provinces other than Northern Cape were more likely to find employment, compared to those from Eastern Cape. The post-Matric and degree holders recorded greater marginal fixed effects, indicating that they had higher chances of being employed. Finally, married household heads were more likely to be employed.

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[32] The regression results in all surveys are presented in Table A.2 in the Appendix.

Table 34: Two-step Heckprobit regressions on employment likelihood, selected surveys

| | OHS1995 | | OHS1999 | | LFS2003b | | LFS2006b | | QLFS2009Q4 | |
|---|---|---|---|---|---|---|---|---|---|---|
| | Marginal fixed effects | x-bar | Marginal fixed effects | x-bar | Marginal fixed effects | x-bar | Marginal fixed effects | x-bar | Marginal fixed effects | x-bar |
| Age: 15-24 years | 0.012 | 0.154 | -0.011 | 0.169 | -0.106 | 0.174 | -0.049 | 0.171 | -0.080 | 0.158 |
| Age: 35-44 years | 0.030 | 0.280 | 0.032 | 0.272 | 0.051 | 0.244 | 0.028 | 0.238 | 0.048 | 0.253 |
| Age: 45-54 years | 0.044 | 0.150 | 0.071 | 0.144 | 0.078 | 0.158 | 0.075 | 0.163 | 0.094 | 0.165 |
| Age: 55-65 years | 0.094 | 0.060 | 0.134 | 0.057 | 0.106 | 0.065 | 0.141 | 0.072 | 0.133 | 0.069 |
| Race: African | -0.132 | 0.678 | -0.213 | 0.698 | -0.253 | 0.723 | -0.212 | 0.746 | -0.193 | 0.733 |
| Race: Coloured | -0.123 | 0.119 | -0.150 | 0.112 | -0.196 | 0.105 | -0.204 | 0.102 | -0.160 | 0.114 |
| Race: Indian | -0.084 | 0.035 | -0.159 | 0.034 | -0.158 | 0.033 | -0.064 | 0.029 | -0.142 | 0.030 |
| ***Gender: Male*** | ***-0.001*** | ***0.583*** | ***-0.002*** | ***0.552*** | ***0.001*** | ***0.553*** | ***0.023*** | ***0.540*** | ***-0.009*** | ***0.542*** |
| Province: WC | 0.026 | 0.137 | 0.051 | 0.133 | 0.041 | 0.129 | 0.086 | 0.126 | -0.013 | 0.140 |
| Province: NC | -0.010 | 0.023 | 0.031 | 0.022 | -0.031 | 0.020 | -0.022 | 0.025 | -0.005 | 0.023 |
| Province: FS | 0.052 | 0.075 | 0.008 | 0.072 | -0.003 | 0.072 | 0.011 | 0.062 | -0.006 | 0.062 |
| Province: KZN | 0.028 | 0.187 | 0.023 | 0.194 | 0.009 | 0.194 | 0.045 | 0.194 | 0.081 | 0.175 |
| Province: NW | 0.043 | 0.079 | 0.037 | 0.075 | 0.027 | 0.076 | 0.008 | 0.066 | -0.018 | 0.063 |
| Province: GAU | 0.016 | 0.272 | 0.019 | 0.252 | -0.021 | 0.259 | 0.030 | 0.270 | -0.043 | 0.294 |
| Province: MPU | 0.048 | 0.060 | 0.019 | 0.068 | 0.050 | 0.066 | 0.022 | 0.074 | -0.005 | 0.069 |
| Province: LIM | 0.030 | 0.061 | -0.048 | 0.078 | -0.010 | 0.072 | -0.006 | 0.067 | 0.001 | 0.072 |
| Education: Primary | -0.004 | 5.304 | -0.007 | 5.315 | -0.005 | 5.473 | -0.005 | 5.522 | 0.002 | 5.677 |
| Education: Secondary | -0.002 | 2.956 | -0.005 | 3.018 | -0.007 | 3.273 | -0.006 | 3.436 | -0.008 | 3.769 |
| Education: Matric | 0.002 | 0.221 | 0.011 | 0.241 | 0.060 | 0.275 | 0.028 | 0.282 | 0.047 | 0.312 |
| Education: Matric + Certificate/Diploma | 0.077 | 0.082 | 0.095 | 0.064 | 0.139 | 0.074 | 0.118 | 0.080 | 0.127 | 0.099 |
| Education: Degree | 0.089 | 0.040 | 0.124 | 0.053 | 0.194 | 0.052 | 0.151 | 0.046 | 0.154 | 0.056 |
| Marital Status: Married | 0.068 | 0.575 | 0.078 | 0.515 | 0.110 | 0.497 | 0.089 | 0.477 | 0.086 | 0.461 |
| Household head | 0.096 | 0.476 | 0.161 | 0.487 | 0.241 | 0.507 | 0.180 | 0.497 | 0.131 | 0.493 |
| Lambda | -0.128 | 0.601 | -0.098 | 0.578 | -0.04 | 0.536 | -0.081 | 0.516 | -0.043 | 0.522 |
| | | | | | | | | | | |
| Observed probability | 0.609 | | 0.580 | | 0.579 | | 0.572 | | 0.554 | |
| Predicted probability | 0.882 | | 0.820 | | 0.783 | | 0.803 | | 0.805 | |
| Number observed (weighted) | 11,435,096 | | 13,207,215 | | 15,741,526 | | 17,039,786 | | 16,966,698 | |
| Chi$^2$ | 2,152,211 | | 2,789,772 | | 4,137,664 | | 3,866,285 | | 3,053,158 | |
| Pseudo R$^2$ | 0.202 | | 0.1931 | | 0.2216 | | 0.1993 | | 0.1622 | |

All explanatory variables are statistically significant at 1%.

To investigate whether feminization of employment took place since the transition, the marginal fixed effects of the male dummy in all Heckprobit employment regressions are presented in Figure 18. Although showing an erratic trend, the marginal fixed effects have always been positive, except in OHS1996, OHS1999, LFS2001a, LFS2004b, LFS2007b, QLFS2009Q3 and QLFS2009Q4, and these findings are attributed to various reasons. For example, the negative marginal effects in OHS1996 and LFS2001a were due to the abrupt decrease in the number of male employed and the over-estimation of female informal workers respectively. On the other hand, in LFS2007b, the female unemployment rate abruptly declined by 4.7 percentage points (see Table 25). Finally, males were more likely to be retrenched in the last two quarters of 2009 as a result of the impact of the global economics recession, as indicated by the narrowing gap between male and female unemployment rates (See Figure 16). To conclude, there seems to be no evidence of feminization of employment since the advent of democracy.

Figure 18: Male Marginal fixed effects of employment, 1995-2009
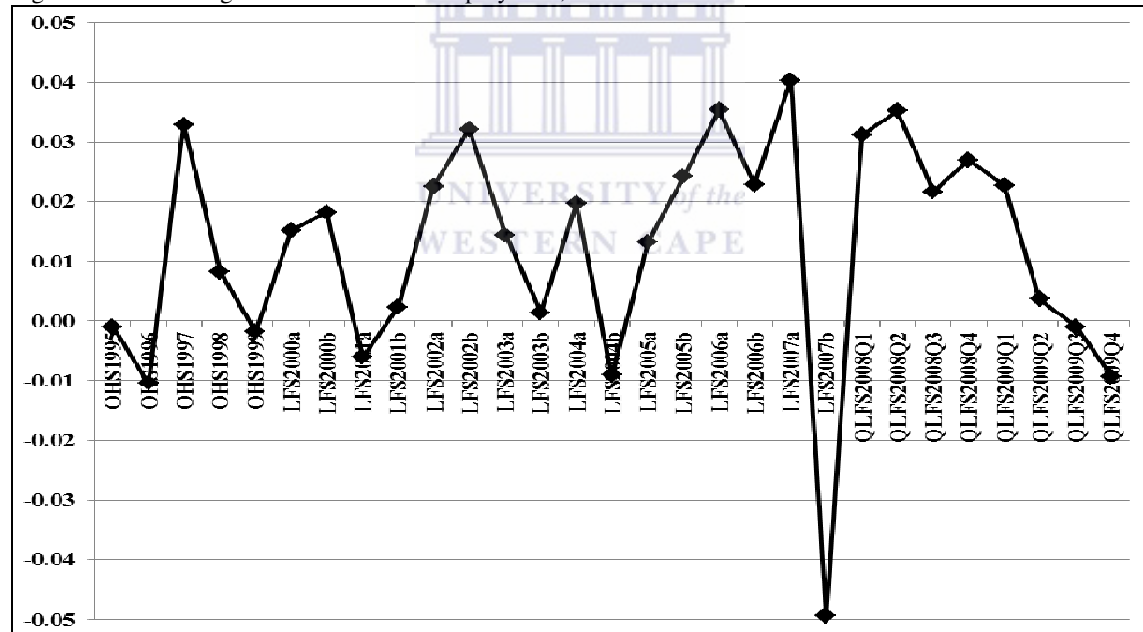


Source: Own calculations using OHS, LFS and QLFS data.

**4.4    Multivariate analyses on log hourly wage (2000 prices) of the employed**

The Ordinary Least Squares (OLS) regression on log hourly wage (2000 prices) of the employed is conditional on participation as well as employment by means of the Heckman three-step approach to deal with the sample selection bias. The following independent variables are included:

- All the independent variables used in the two-step Heckprobit regressions on employment likelihood, except the age dummy variables
- Years of work experience dummy variable (derived as: age - years of education - 6)
- Occupation dummy variable (Reference group: Elementary occupations)
- Industry dummy variable  (Reference group: Agriculture)
- Self-employed dummy variable
- Public/Private sector status (Reference group: Private sector)
- Formal/Informal sector status(Reference group: Formal sector)
- Trade union membership status of the employees (Reference group: not member)

Table 35 presents results in selected surveys[33]. Most independent variables, including the lambda (i.e., sample selection bias was present), were statistically significant at the 1% level of significance. All races earned less than Whites. Indians were the second highest earners followed by Coloureds, while Africans earned least. Looking at the province dummy variables, in general, employed from Western Cape and Gauteng earned more. The educational splines and dummy variables illustrate a positive relationship between education attainment and wage. In addition, married household heads with longer years of experience earned more.

Looking at the impact of occupation and industry categories of the employed on their hourly wage, it was found that those involved in highly-skilled occupations and tertiary industry activities enjoyed higher wages. Furthermore, self-employed, public sector workers, formal sector workers as well as employees with trade union membership earned higher wages.

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[33] The regression results in all surveys are presented in Table A.3 in the Appendix.

Table 35: Three-step Heckman regressions on log hourly wage (2000 prices) of employed, selected surveys

| | OHS1995 | OHS1999 | LFS2003b | LFS2006b | LFS2007b |
|---|---|---|---|---|---|
| Race: African | -0.574*** | -0.614*** | -0.734*** | -0.632*** | -0.726*** |
| Race: Coloured | -0.381*** | -0.414*** | -0.440*** | -0.372*** | -0.376*** |
| Race: Indian | -0.247*** | -0.157*** | -0.285*** | -0.165*** | -0.111*** |
| ***Gender: Male*** | ***0.184****** | ***0.167****** | ***0.156****** | ***0.163****** | ***0.192****** |
| Province: WC | 0.094*** | 0.467*** | 0.343*** | 0.317*** | 0.261*** |
| Province: NC | -0.097*** | 0.169*** | 0.045 | -0.013 | 0.047*** |
| Province: FS | -0.317*** | -0.183*** | -0.079 | -0.014 | 0.011*** |
| Province: KZN | 0.116*** | 0.226*** | 0.201*** | 0.123*** | 0.061*** |
| Province: NW | 0.047*** | 0.181*** | 0.117*** | 0.082*** | 0.087*** |
| Province: GAU | 0.259*** | 0.431*** | 0.391*** | 0.315*** | 0.381*** |
| Province: MPU | 0.071*** | 0.225*** | 0.121*** | 0.092*** | 0.097*** |
| Province: LIM | 0.196*** | 0.247*** | -0.016*** | -0.115*** | -0.107*** |
| Education: Primary | 0.020*** | 0.035*** | 0.025*** | 0.023*** | 0.016*** |
| Education: Secondary | 0.099*** | 0.081*** | 0.076*** | 0.059*** | 0.069*** |
| Education: Matric | 0.192*** | 0.170*** | 0.206*** | 0.214*** | 0.157*** |
| Education: Post Matric (Certificate/diploma) | 0.422*** | 0.487*** | 0.502*** | 0.616*** | 0.604*** |
| Education: Degree | 0.650*** | 0.599*** | 0.679*** | 0.890*** | 1.112*** |
| Marital Status: Married | 0.094*** | 0.092*** | 0.106*** | 0.070*** | 0.102*** |
| Household head | 0.211*** | 0.104*** | 0.090*** | 0.031*** | 0.153*** |
| Years of experience | 0.033*** | 0.027*** | 0.021*** | 0.018*** | 0.019*** |
| Years of experience squared | 0.000*** | 0.000*** | 0.000*** | 0.000*** | 0.000*** |
| Occupation: Manager | 0.653*** | 0.564*** | 0.845*** | 0.903*** | 0.743*** |
| Occupation: Professionals | 0.512*** | 0.578*** | 0.635*** | 0.558*** | 0.534*** |
| Occupation: Professionals and Technicians | 0.521*** | 0.434*** | 0.528*** | 0.483*** | 0.511*** |
| Occupation: Clerk | 0.260*** | 0.253*** | 0.350*** | 0.356*** | 0.420*** |
| Occupation: Service | 0.120** | 0.026** | 0.041*** | 0.040** | 0.039*** |
| Occupation: Skilled agricultural workers | 0.652*** | 0.088*** | 0.264*** | 0.319*** | 0.211*** |
| Occupation: Trade | 0.199*** | 0.198*** | 0.255*** | 0.257*** | 0.249*** |
| Occupation: Operators | 0.124*** | 0.105*** | 0.177*** | 0.151*** | 0.176*** |
| Occupation: Domestic | -0.858*** | -0.322*** | -0.488*** | -0.322*** | -0.266*** |
| Occupation: Other | 0.487 | 0.321 | 0.248 | 1.334 | 0.178 |
| Industry: Mining | 0.609*** | 0.746*** | 0.713*** | 0.844*** | 0.826*** |
| Industry: Manufacturing | 0.639*** | 0.745*** | 0.540*** | 0.466*** | 0.463*** |
| Industry: Electricity, Water and Gas | 0.747*** | 1.008*** | 0.833*** | 0.697*** | 0.811*** |
| Industry: Construction | 0.552*** | 0.701*** | 0.482*** | 0.412*** | 0.410*** |
| Industry: Wholesale and Retail | 0.543*** | 0.575*** | 0.333*** | 0.228*** | 0.263*** |
| Industry: Transport , Storage and Communications | 0.695*** | 0.781*** | 0.541*** | 0.505*** | 0.541*** |
| Industry:  Financial and Business services | 0.662*** | 0.810*** | 0.614*** | 0.419*** | 0.483*** |
| Industry:  Personal and Social services | 0.514*** | 0.690*** | 0.525*** | 0.402*** | 0.400*** |
| Industry: Private services | 0.149*** | 0.512*** | 0.591*** | 0.461*** | 0.431*** |
| Industry: Other | 0.673*** | 0.768*** | 0.635*** | 0.394*** | 0.142*** |
| Self-employed | 0.611*** | 0.181*** | 0.134*** | 0.094*** | 0.110*** |
| Public sector workers | 0.216*** | -0.369*** | -0.548*** | -0.470*** | -0.433*** |
| Informal sector workers | -0.335*** | 0.189*** | 0.336*** | 0.327*** | 0.333*** |
| Union member | 0.151*** | 0.247*** | 0.262*** | 0.257*** | 0.176*** |
| Lambda | 0.242*** | -0.088*** | -0.025*** | -0.145*** | 0.090*** |
| | | | | | |
| Constant | 0.559 | 0.290 | 0.641 | 0.954*** | 0.863 |
| R-squared | 0.642 | 0.489 | 0.645 | 0.593 | 0.615 |
| Adjusted R-squared | 0.642 | 0.488 | 0.644 | 0.592 | 0.614 |
| Number of observed (weighted) | 9,499,347 | 10,356,143 | 11,411,351 | 12,787,285 | 13,293,327 |

*** Significant at 1%          ** Significant at 5%          * Significant at 1%

Figure 19 displays male coefficients of the Heckman regressions between 1995 and 2007. The coefficients were always positive during the entire period, indicating that males earned more than females. Even though a downward trend was recorded during the OHS years, males still earned more, after taking into account for differences in demographic, education and work characteristic.

Figure 19: Male earnings coefficients of the log hourly wage (2000 prices) regressions, 1995-2007
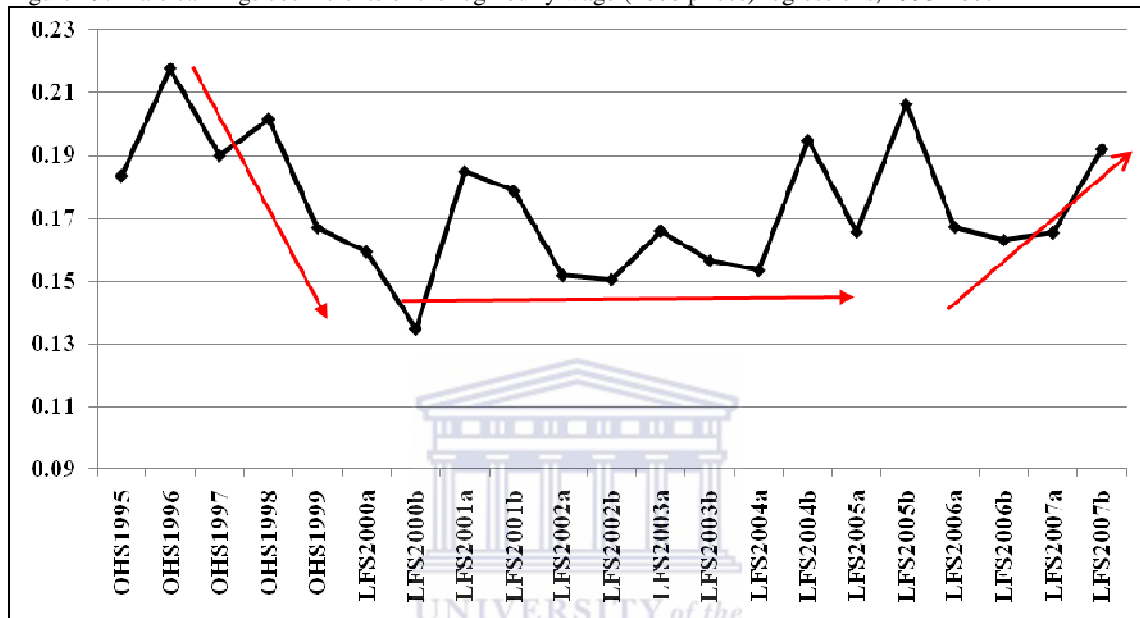


Source: Own calculations using OHS, LFS and QLFS data.

To conclude, the multivariate analyses conducted on labour force participation likelihood, employment likelihood and the wage of the employed did not indicate that feminization of the labour market took place since the advent of democracy, confirming the findings in the bivariate analyses conducted in Chapter 3.

# CHAPTER 5: GENDER GAP IN EMPLOYMENT AND WAGES

## 5.1    Introduction

Chapter 4 found that there was no evidence of feminization in labour force participation and employment likelihood, and the male employed earned more. This chapter aims to investigate the gender gap in employment likelihood and log hourly wage gap in greater detail by conducting the Oaxaca-Blinder (1973) decomposition[34], so as to find out if the gender gap in employment and wages was caused by the differences in the characteristics of people in each gender, or rather attributed to gender discrimination by the employers.

## 5.2    The Oaxaca-Blinder (1973) decomposition technique in bivariate regressions

Borjas (2010) discusses different ways in which economic analysts measure the extent of racial and gender wage discrimination[35], one of which being the difference between mean wages of each gender. Assuming that wages for both genders are influenced by educational attainment only, their earnings equations are presented as: $w_m = \alpha_m + \beta_m s_m$ being the males' earning equation and $w_f = \alpha_f + \beta_f s_f$ as the females' earnings equation, with $s_m$ and $s_f$ standing for the male and female years of educational attainment respectively.

$\beta_m$ and $\beta_f$ measure the magnitude of each gender's wage increase as a result of an addition year of education. Both coefficients are assumed to be equal if their employers value the educational qualification attained by each gender equally. Likewise, both intercepts (i.e., $\alpha_m$ and $\alpha_f$) will be equal if employers values skills of each gender equally.

The mean wage differential by gender is: $\Delta \overline{w} = \overline{w_m} - \overline{w_f} = \alpha_m + \beta_m \overline{s_m} - \alpha_f - \beta_f \overline{s_f}$, where $\overline{s_m}$ and $\overline{s_f}$ are the average years of education for males and females respectively.

The Oaxaca-Blinder (1973) technique decomposes the mean male-female wage differentials into two components: (1) a portion that arises because two variables under investigations, on

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[34] Other advanced decomposition techniques like the Brown-Moon-Zoloth decomposition and Juhn-Murphy-Pierce decomposition fall beyond the scope of this study and won't be discussed and applied.
[35] Oaxaca (1973) described discrimination against females as a situation where "the relative wage of males exceeds the relative wage of females that would have prevailed if males and females were paid according to the same criteria".

average, have dissimilar qualifications or credentials e.g., years of schooling (i.e. the explained component) and (2) a portion that arises because one group is more favorably treated than the other given the same individual characteristics (unexplained component), due to other independent variables not included in the regressions (e.g., gender, province, etc.), difference in quality of education, and the presence of gender wage discrimination.

The mean wage differential equation could be re-written as:

$$\Delta \overline{w} = (\alpha_m - \alpha_f) + (\beta_m - \beta_f)\overline{s_f} + \beta_m(\overline{s_m} - \overline{s_f})$$

This equation consists of two components: $(\alpha_m - \alpha_f) + (\beta_m - \beta_f)\overline{s_f}$ explains differentials due to discrimination (i.e. the unexplained component) while $\beta_m(\overline{s_m} - \overline{s_f})$ explains differentials due to difference in education (i.e. the explained component). The second component will be zero if both genders have the equal means years of schooling. The wage gap that arises due to discrimination will occur if (a) the unexplained component is positive, implying that employers value men's educational qualification more than women's and/or (b) despite having similar educational qualifications, employers still pay men more income than females.
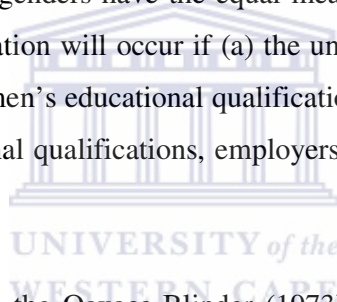
Figure 20 graphically illustrates the Oaxaca-Blinder (1973) decomposition technique (once again, assuming there is only one independent variable, namely years of education). It shows that compared to the female's earnings functions, men's earnings function has a higher intercept and a steeper slope. This implies that with zero years of education, men get paid more than females. Assuming the mean years of educational attainment are seven and 10 for females and males respectively, while the mean monthly earnings are R1 000 and R3 500 respectively. Even if the female has exactly the same years of educational attainment as males (seven years), they earn less (R1 000 versus R2 000). This stands for the unexplained component of the wage gap and could be attributed to wage discrimination by the employer.

If the females are now paid R2 000, the difference between what the males earn on average (R3 500) and the R2 000 the females earn stand for the explained component of wage difference-due to the fact that males are really more educated on average. This wage gap is acceptable, i.e. the explained component.

Figure 20: Measuring the impact of discrimination on gender wage difference



## 5.3    The Oaxaca-Blinder (1973) decomposition technique in multivariate regressions

In addition to educational attainment, other variables like age, province of residence, skills level of occupation, etc. also have an influence on the gender difference (if any) in earnings. Hence, multivariate regressions on earnings should be conducted on each gender, before the Oaxaca-Blinder (1973) decomposition is applied.

The log of wages ($\ln w$) as a dependent variable is explained by a set of individual characteristics ($x_i$). Expressing the wage equation in matrix formation leads to:

$\ln w_m - \ln w_f = X\beta + \varepsilon$ (Equation 1), where X includes a constant. $\beta$ stands for a vector of explanatory variables (education, race, province, age, etc). Next, the difference in the average log of wages for males and females can be expressed as follows:

$\ln \overline{w_m} - \ln \overline{w_f} = \overline{X_m}\beta_m - \overline{X_f}\beta_f$ (Equation 2), where $\overline{w_m}$ and $\overline{w_f}$ represent the average wage of males and females respectively, $\overline{X_m}$ and $\overline{X_f}$ are vectors containing the productive characteristics evaluated at the average for males and females respectively, $\beta_m$ is a vector of coefficients representing the market's valuation of the male characteristics, $\beta_f$ is the vector of coefficients representing the market's valuation of the female characteristics. If these two coefficients differ, this means the labour market rewards the same characteristics possessed by the two genders differently.

Re-writing equation 2:

$$\ln \overline{w_m} - \ln \overline{w_f} = (\overline{X_m} - \overline{X_f})\beta^* + \overline{X_m}(\beta_m - \beta^*) + \overline{X_f}(\beta^* - \beta_f)$$ (Equation 3), where $\beta^*$ stands

for a vector of coefficients that would prevail in the absence of discrimination.

Equation 3 above shows that the difference in log of wages for males and females (i.e. wage gap) is made up of three components on the right hand side of the equation. The first component, $(\overline{X_m} - \overline{X_f})\beta^*$ is the difference in average productive characteristics between males and females. The second component, $\overline{X_m}(\beta_m - \beta^*)$, means the difference between what male employees are earn and what they would earn in a non-discriminating labour market. Finally, the third component, $\overline{X_f}(\beta^* - \beta_f)$, measures the difference between what female employees would earn in a non-discriminatory environment and what they are actually earning. Note that the last two terms represents the unexplained component of the wage gap.

Assuming the wage gap is solely due to female disadvantage, this means the male wage structure would prevail in a non-discriminating labour market so that $\beta^* = \beta_m$, then equation 3 could be reduced to: $\ln \overline{w_m} - \ln \overline{w_f} = (\overline{X_m} - \overline{X_f})\beta_m + \overline{X_f}(\beta_m - \beta_f)$.

## 5.4 The Oaxaca-Blinder (1973) decomposition on average male-female log hourly wage gap

The results of the decomposition of the average male-female log hourly wage gap in 1995-2007 trends are presented in Figure 21. This gap has been quite stable throughout the years, except the greater gaps observed in LFS2000a and LFS2001a, as well as the slight downward trend in the 2006-2007 LFSs. The unexplained component was relatively higher during the OHS years. This implies that there were features of wage discrimination (i.e. males were paid more than their female counterparts) in the labour market during this period. However, compared to the explained component, the unexplained component were less dominant between LFS2000a and LFS2004a. The unexplained component of the labour market increased again between LFS2005a and LFS2007b. This implies that the Affirmative Action policies have not been successful in reducing the labour market wage discrimination.

Figure 21: Decomposition of the male-female mean log of hourly wage (2000 prices) gap, 1995-2007
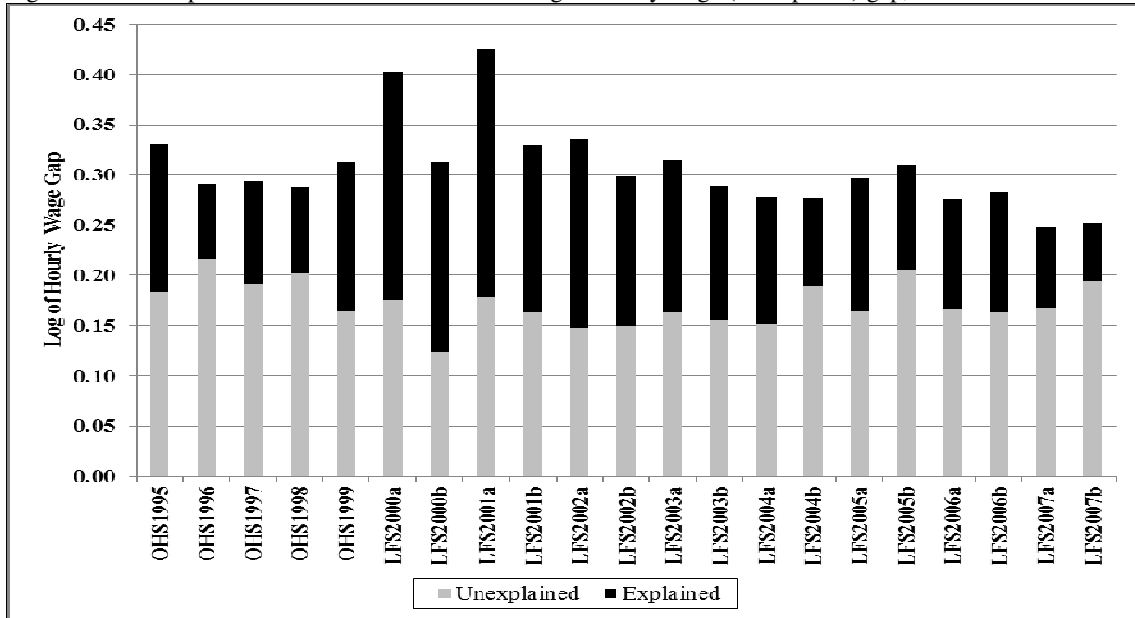


Source: Own calculations using OHS and LFS and data.

Since it was argued that Affirmative Action has negligible impact on informal activities, the Oaxaca-Blinder (1973) decomposition on wage gap is done again by excluding self-employed, informal sector workers and agricultural workers. Figure 22 presents the results, and once gain it could be seen that the unexplained component did not show any obvious downward trend during the period under study (except in the OHSs).

Figure 22: Decomposition of the male-female mean log of hourly wage (2000 prices) gap, by excluding informal, domestic, agricultural workers and self-employed, 1997-2007
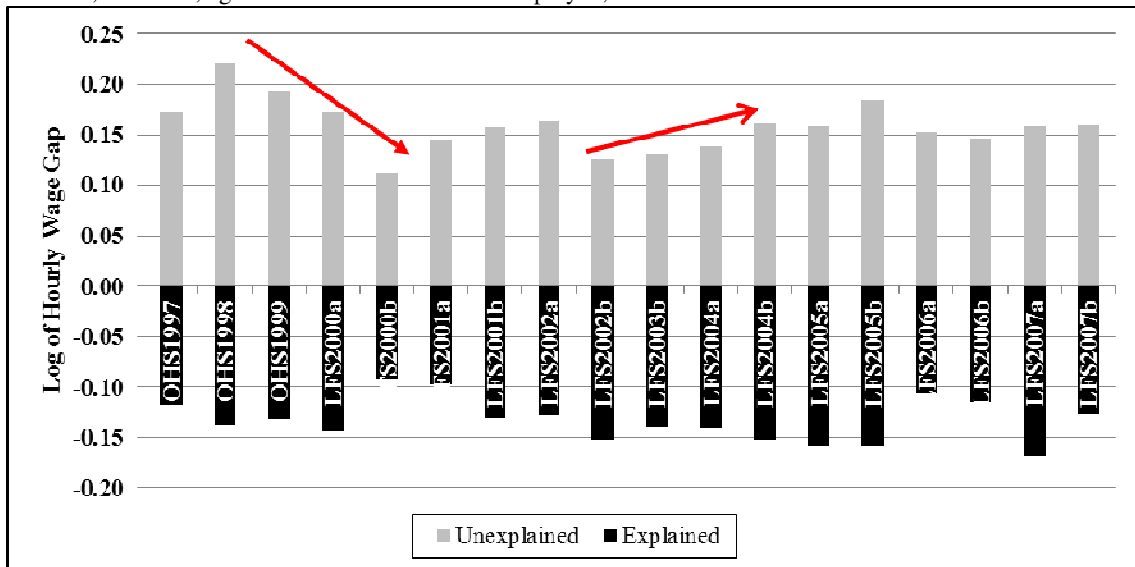


Source: Own calculations using OHS and LFS data.

Figures A.3 and A.4 in the Appendix present the decomposition results on the African mean

gender wage gap, and similar results as found in Figures 21 and 22 are obtained.

## 5.5 The Oaxaca-Blinder (1973) decomposition on average male-female employment gap

The Oaxaca-Blinder (1973) decomposition technique could also be applied to analyze employment probability gap. The employment differential between gender is represented as:

$$L_m^{'} - L_f^{'} = \left[ L^{'}(X_m\beta*) - L^{'}(X_f\beta*) \right] + \left[ L^{'}(X_m\beta_m) - L^{'}(X_m\beta*) \right] + \left[ L^{'}(X_f\beta_f) - L^{'}(X_f\beta*) \right]$$

$L_m^{'}$ represents average values of male employment probability while $L_f^{'}$ stands for the average values of female employment probability in the labour market. The employment gap follows simailar decompositions (explained and unexplained components) applied in the wage gap above.

Figure 23 presents the results. It shows a stable employment gap trend during the OHS years. The changeover over from OHS to LFS saw the employment trend declining. However, this can be linked to improvement data capturing of the employed. Overall, the LFS years witnessed a declining trend. The employment gap was clearly lower during the QLFS years (as mentioned before, males were more likely to be retrenched during the 2008-2009 recessions). The employment gap has always been heavily dominant by the explained component. On the other hand, the unexplained component was negative in some surveys, which suggest that males were rather the group to be discriminated against in terms of employment opportunities, after controlling for differences in characteristics.

Figure 23: Decomposition of average male-female employment gap, 1995-2009
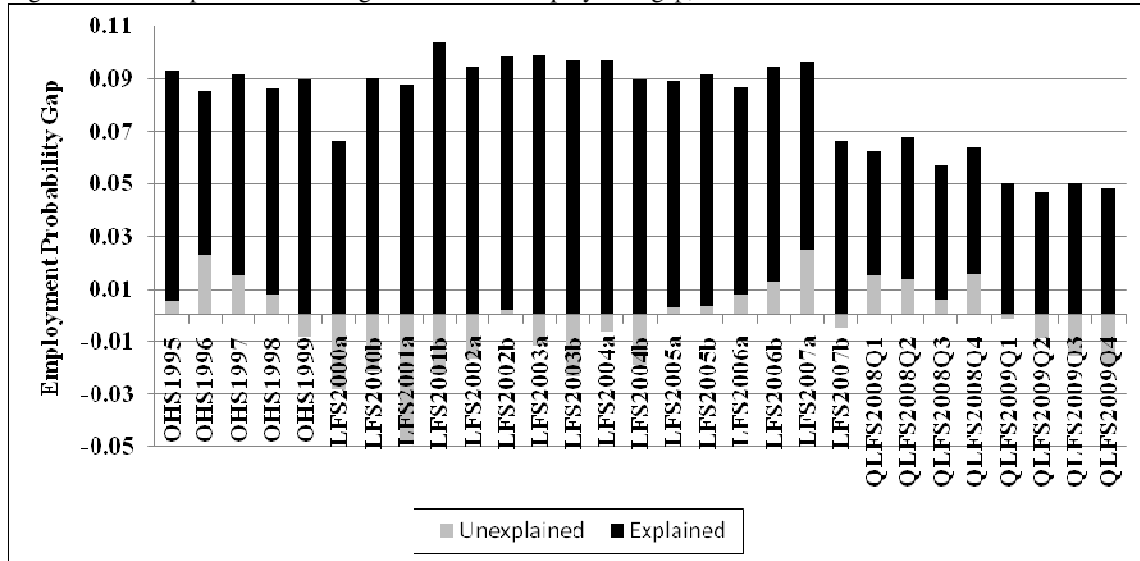
The Oaxaca-Blinder (1973) decomposition on mean gender employment gap was conducted once again in Figure 24 by excluding informal, domestic, agricultural workers and self-employed. The results show that the explained component has become much less dominant. In fact, the unexplained component was more dominant in some surveys (e.g., OHS1997, LFS2007a, etc.). The unexplained component showed a downward trend between OHS1997 and LFS2000a, but an upward trend in LFS 2005-2007. Both the explained and unexplained components became smaller in the QLFSs.

Figure 24: Decomposition of average male-female employment gap, by excluding informal, domestic, agricultural workers and self-employed, 1997-2009
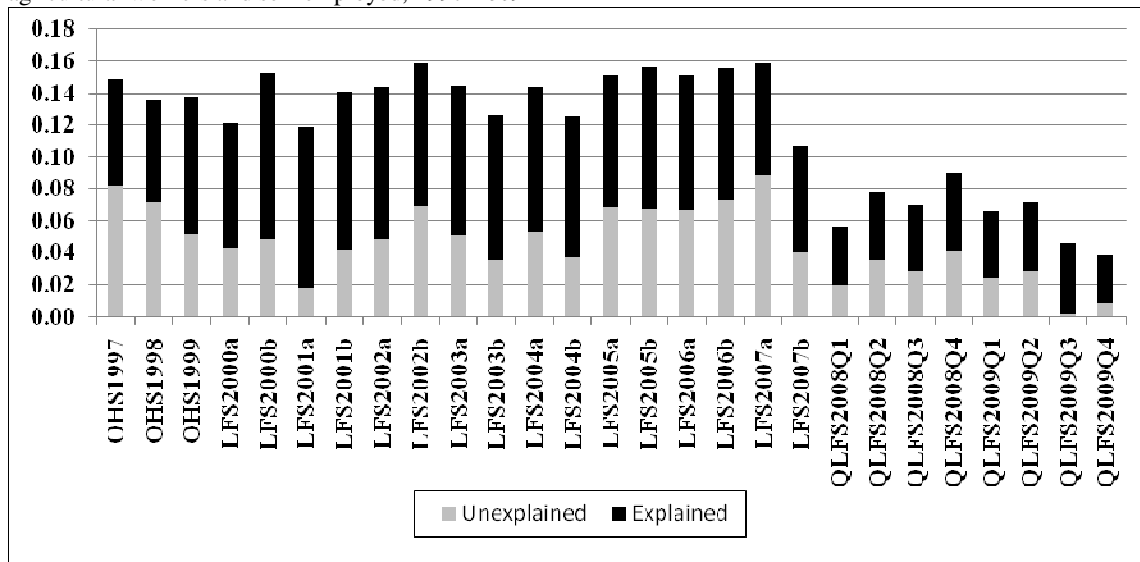
Figures A.5 and A.6 in the Appendix presents the Oaxaca-Blinder (1973) decomposition on the African mean gender employment gap, and in general, the similar results as found in Figures 23 and 24 are obtained.

To conclude this chapter, with the application of the Oaxaca-Blinder decomposition to analyze the mean gender employment gap and log hourly wage gap, the results show that the unexplained component did not show any clear downward trend since the transition. This implies that Affirmative Action might not have been successful to reduce labour market discrimination.

# CHAPTER 6: CONCLUSION

This study focused on the narrow definition of labour market status to investigate how each gender fared in the labour market since the fall of apartheid in South Africa by using all labour survey data from 1995-2009. Demographic trends of the LF were discussed and it was found out that the LF number as well as the LFPRs increased during this period. Most of the increases were, however, attributed to males, while females showed dominance in the percentage of individuals with at least Matric as well as higher mean years of education of the LF. In this regard, the LF was more educated on average. With respect to the characteristics of the employed, the study found out that most of the employed were African males, living in Gauteng, Kwazulu-Natal and the Western Cape provinces whereas Women were over-represented in the low-paying unskilled elementary domestic work. Furthermore, the labour market demanded skilled workforce compared to unskilled one's and the majority of the employed belonged in the aged 25-44 age cohort.

Although the females recorded an EAR exceeding 100% between LFS2004b and the QLFS2009Q4, the TGR, AGR and the EAR showed that the economy did not create enough employment to absorb new entrants in the labour market when comparing OHS1995 with QLFS2009Q4. In addition, the earnings trend showed that males earned more than females while an exclusion of the zero-earners, outliers, self-employed and informal sector workers led to stable trend.

During the period under investigation, women were more likely to be unemployed than their male counterparts, but the unemployment rate gap of the two genders narrowed during the last few years of the QLFS. Individuals without Matric, living in the Limpopo and the Eastern Cape provinces also recorded high unemployment rates. The labour market showed signs of youth unemployment for the period under investigation.

Furthermore, simple one-step probit, two-step Heckprobit as well as three-step Heckman regressions were applied to analyze the impact of different explanatory variables on the likelihood of the labour force participation, probability of LF being employed and the log real hourly wage of the employed respectively. The result showed that males were associated with greater likelihood of both labour force participation and employment, and earned more than their female counterparts.

Finally, employment and wage discrimination (if any) were investigated by using the Oaxaca-Blinder (1973) decomposition technique and the results showed that the unexplained component of the employment and wage gaps did not exhibit any declining trends, indicating that Affirmative Action policies were not successful in reducing discriminations. In addition, using the same technique, the thesis also derived the formal sector employment and wage gaps and continued to show a non-declining unexplained component while the explained component of the employment gap was dominant.

To conclude, this thesis found that since the advent of democracy, although the female labour force number, labour force participation rates and employment likelihood showed an increase, the results did not indicate that feminization of labour force participation and employment took place. The male employed earned more on average, even after controlling for differences in various characteristics. The unexplained components of both the mean male-female employment gap and log real hourly wage gap did not show any obvious declining trend, implying that gender discrimination in the labour market might still have taken place since the transition, despite the implementation of post-apartheid labour market legislations.
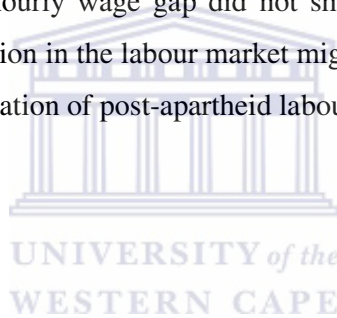
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Table A.1: Probit regressions on narrow labour force participation likelihood, 1995-2009

| | OHS1995 | OHS1996 | OHS1997 | OHS1998 | OHS1999 |
|---|---|---|---|---|---|
| | **Marginal fixed effects** | | | | |
| Age: 15-24 years | -0.347 | -0.344 | -0.350 | -0.366 | -0.360 |
| Age: 35-44 years | 0.006 | 0.045 | 0.033 | 0.008 | 0.023 |
| Age: 45-54 years | -0.119 | -0.078 | -0.087 | -0.113 | -0.111 |
| Age: 55-65 years | -0.378 | -0.300 | -0.313 | -0.366 | -0.375 |
| Race: African | 0.012 | -0.047 | 0.009 | -0.015 | -0.011 |
| Race: Coloured | 0.140 | 0.135 | 0.148 | 0.111 | 0.103 |
| Race: Indian | 0.042 | -0.012 | 0.047 | -0.026 | 0.015 |
| ***Gender: Male*** | ***0.161*** | ***0.174*** | ***0.174*** | ***0.169*** | ***0.129*** |
| Province: WC | 0.171 | 0.127 | 0.201 | 0.108 | 0.164 |
| Province: NC | 0.099 | 0.068 | 0.151 | 0.084 | 0.081 |
| Province: FS | 0.126 | 0.155 | 0.174 | 0.131 | 0.097 |
| Province: KZN | 0.089 | 0.091 | 0.123 | 0.103 | 0.095 |
| Province: NW | 0.080 | 0.060 | 0.135 | 0.102 | 0.047 |
| Province: GAU | 0.195 | 0.198 | 0.247 | 0.177 | 0.126 |
| Province: MPU | 0.072 | 0.098 | 0.160 | 0.152 | 0.102 |
| Province: LIM | -0.084 | -0.041 | 0.024 | 0.015 | -0.002 |
| Education: Primary | 0.008 | 0.012 | 0.007 | 0.008 | 0.006 |
| Education: Secondary | -0.007 | 0.001 | 0.004 | 0.008 | 0.006 |
| Education: Matric | 0.205 | 0.184 | 0.208 | 0.229 | 0.187 |
| Education: Matric + Certificate/Diploma | 0.305 | 0.326 | 0.362 | 0.341 | 0.317 |
| Education: Degree | 0.285 | 0.293 | 0.335 | 0.322 | 0.279 |
| Household head | 0.299 | 0.196 | 0.223 | 0.215 | 0.252 |
| Marital Status: Married | 0.091 | 0.071 | 0.071 | 0.085 | 0.067 |
| No. of children age 0-14 years in the hhold | -0.016 | -0.018 | -0.016 | -0.019 | -0.022 |
| No. of male aged 15-59 years in the hhold | -0.006 | -0.011 | -0.002 | 0.004 | -0.003 |
| No. of females aged 15-59 years in the hhold | 0.008 | 0.014 | 0.023 | 0.015 | 0.016 |
| No. of elderly aged 60+ years in the hhold | -0.033 | -0.044 | -0.036 | -0.040 | -0.046 |
| | | | | | |
| Observed probability | 0.582 | 0.542 | 0.549 | 0.584 | 0.594 |
| Predicted probability | 0.479 | 0.439 | 0.442 | 0.489 | 0.522 |
| Number of observations (weighted) | 23,968,482 | 24,582,557 | 25,445,923 | 25,584,456 | 25,800,072 |
| Chi$^2$ | 8,777,258 | 8,089,431 | 8,653,135 | 8,534,923 | 8,701,873 |
| Pseudo R$^2$ | 0.265 | 0.239 | 0.247 | 0.241 | 0.243 |

Note: All explanatory variables are statistically significant at 1%.

Table A.1: continued

| | LFS2000a | LFS2000b | LFS2001a | LFS2001b | LFS2002a | LFS2002b | LFS2003a | LFS2003b |
|---|---|---|---|---|---|---|---|---|
| | **Marginal fixed effects** | | | | | | | |
| Age: 15-24 years | -0.357 | -0.350 | -0.359 | -0.374 | -0.350 | -0.359 | -0.368 | -0.344 |
| Age: 35-44 years | -0.004 | 0.018 | 0.019 | 0.001 | 0.017 | 0.016 | 0.005 | 0.004 |
| Age: 45-54 years | -0.099 | -0.088 | -0.101 | -0.135 | -0.107 | -0.123 | -0.136 | -0.104 |
| Age: 55-65 years | -0.369 | -0.349 | -0.347 | -0.388 | -0.377 | -0.381 | -0.394 | -0.366 |
| Race: African | 0.107 | 0.118 | 0.120 | 0.076 | 0.086 | 0.095 | 0.093 | 0.090 |
| Race: Coloured | 0.125 | 0.132 | 0.137 | 0.132 | 0.150 | 0.159 | 0.140 | 0.136 |
| Race: Indian | 0.024 | 0.024 | 0.031 | 0.052 | 0.021 | 0.044 | 0.059 | 0.034 |
| ***Gender: Male*** | ***0.085*** | ***0.124*** | ***0.098*** | ***0.120*** | ***0.120*** | ***0.118*** | ***0.117*** | ***0.131*** |
| Province: WC | 0.073 | 0.095 | 0.097 | 0.088 | 0.002 | 0.082 | 0.103 | 0.132 |
| Province: NC | -0.038 | 0.069 | 0.054 | 0.043 | -0.053 | 0.048 | 0.052 | 0.046 |
| Province: FS | 0.065 | 0.069 | 0.089 | 0.088 | 0.017 | 0.094 | 0.089 | 0.078 |
| Province: KZN | 0.019 | 0.077 | 0.066 | 0.025 | 0.017 | 0.091 | 0.032 | 0.056 |
| Province: NW | -0.052 | -0.009 | 0.002 | -0.002 | -0.103 | 0.023 | -0.010 | 0.008 |
| Province: GAU | 0.024 | 0.121 | 0.124 | 0.135 | -0.003 | 0.128 | 0.093 | 0.113 |
| Province: MPU | -0.004 | 0.073 | 0.085 | 0.067 | -0.038 | 0.061 | 0.041 | 0.060 |
| Province: LIM | -0.063 | -0.081 | -0.077 | -0.052 | -0.161 | -0.076 | -0.068 | 0.080 |
| Education: Primary | 0.000 | 0.003 | 0.001 | 0.006 | 0.000 | 0.003 | 0.007 | 0.011 |
| Education: Secondary | 0.004 | 0.006 | 0.007 | 0.015 | 0.014 | 0.016 | 0.008 | 0.011 |
| Education: Matric | 0.169 | 0.156 | 0.164 | 0.168 | 0.160 | 0.166 | 0.172 | 0.186 |
| Education: Matric + Certificate/Diploma | 0.224 | 0.252 | 0.240 | 0.237 | 0.272 | 0.247 | 0.294 | 0.321 |
| Education: Degree | 0.193 | 0.259 | 0.240 | 0.265 | 0.248 | 0.282 | 0.285 | 0.304 |
| Household head | 0.201 | 0.226 | 0.214 | 0.229 | 0.206 | 0.215 | 0.214 | 0.227 |
| Marital Status: Married | 0.085 | 0.097 | 0.084 | 0.068 | 0.079 | 0.069 | 0.069 | 0.074 |
| No. of children age 0-14 years in the hhold | -0.010 | -0.015 | -0.013 | -0.021 | -0.018 | -0.017 | -0.023 | -0.028 |
| No. of male aged 15-59 years in the hhold | 0.005 | -0.003 | 0.003 | 0.005 | -0.002 | 0.005 | 0.001 | 0.000 |
| No. of females aged 15-59 years in the hhold | 0.000 | 0.007 | 0.002 | 0.009 | 0.011 | 0.007 | 0.014 | 0.009 |
| No. of elderly aged 60+ years in the hhold | -0.035 | -0.037 | -0.043 | -0.035 | -0.032 | -0.039 | -0.048 | -0.058 |
| | | | | | | | | |
| Observed probability | 0.664 | 0.661 | 0.659 | 0.637 | 0.652 | 0.642 | 0.641 | 0.627 |
| Predicted probability | 0.522 | 0.641 | 0.620 | 0.624 | 0.587 | 0.593 | 0.598 | 0.570 |
| Number of observations (weighted) | 26,193,767 | 27,549,484 | 27,820,557 | 27,818,702 | 28,072,728 | 28,240,211 | 28,533,929 | 28,738,730 |
| Chi$^2$ | 7,002,116 | 8,532,095 | 8,377,250 | 8,828,517 | 8,201,206 | 8,778,468 | 8,963,541 | 9,697,715 |
| Pseudo R$^2$ | 0.243 | 0.200 | 0.229 | 0.223 | 0.232 | 0.227 | 0.230 | 0.245 |

Note: All explanatory variables are statistically significant at 1%.

Table A.1: continued

| | LFS2004a | LFS2004b | LFS2005a | LFS2005b | LFS2006a | LFS2006b | LFS2007a | LFS2007b |
|---|---|---|---|---|---|---|---|---|
| | | | | **Marginal fixed effects** | | | | |
| Age: 15-24 years | -0.351 | -0.340 | -0.363 | -0.356 | -0.365 | -0.352 | -0.365 | -0.370 |
| Age: 35-44 years | -0.004 | 0.011 | -0.006 | -0.009 | -0.023 | 0.014 | -0.007 | 0.004 |
| Age: 45-54 years | -0.113 | -0.081 | -0.104 | -0.095 | -0.106 | -0.086 | -0.113 | -0.088 |
| Age: 55-65 years | -0.349 | -0.330 | -0.337 | -0.360 | -0.355 | -0.347 | -0.346 | -0.356 |
| Race: African | 0.097 | 0.060 | 0.066 | 0.092 | 0.066 | 0.101 | 0.089 | 0.065 |
| Race: Coloured | 0.164 | 0.118 | 0.114 | 0.130 | 0.092 | 0.131 | 0.114 | 0.084 |
| Race: Indian | 0.006 | -0.004 | 0.011 | 0.033 | -0.020 | -0.013 | -0.045 | -0.049 |
| *Gender: Male* | *0.125* | *0.134* | *0.126* | *0.117* | *0.119* | *0.112* | *0.122* | *0.143* |
| Province: WC | 0.136 | 0.100 | 0.079 | 0.094 | 0.063 | 0.062 | 0.144 | 0.128 |
| Province: NC | 0.065 | 0.001 | 0.023 | -0.010 | -0.029 | 0.037 | 0.095 | 0.071 |
| Province: FS | 0.114 | 0.056 | 0.055 | 0.055 | -0.028 | -0.036 | 0.043 | 0.042 |
| Province: KZN | 0.089 | 0.012 | 0.012 | 0.028 | -0.048 | 0.003 | 0.055 | 0.046 |
| Province: NW | 0.048 | -0.021 | -0.018 | 0.003 | -0.048 | -0.051 | 0.048 | 0.010 |
| Province: GAU | 0.142 | 0.081 | 0.065 | 0.098 | 0.015 | 0.072 | 0.115 | 0.118 |
| Province: MPU | 0.095 | 0.057 | 0.041 | 0.034 | -0.008 | 0.026 | 0.080 | 0.090 |
| Province: LIM | -0.053 | -0.088 | -0.133 | -0.115 | -0.178 | -0.170 | -0.091 | -0.094 |
| Education: Primary | 0.008 | 0.009 | 0.012 | 0.009 | 0.006 | 0.005 | 0.010 | 0.006 |
| Education: Secondary | 0.018 | 0.016 | 0.014 | 0.016 | 0.014 | 0.020 | 0.016 | 0.019 |
| Education: Matric | 0.169 | 0.165 | 0.167 | 0.164 | 0.164 | 0.155 | 0.148 | 0.151 |
| Education: Matric + Certificate/Diploma | 0.303 | 0.310 | 0.278 | 0.263 | 0.258 | 0.266 | 0.279 | 0.280 |
| Education: Degree | 0.285 | 0.252 | 0.275 | 0.220 | 0.253 | 0.251 | 0.252 | 0.321 |
| Household head | 0.229 | 0.226 | 0.223 | 0.212 | 0.206 | 0.220 | 0.202 | 0.203 |
| Marital Status: Married | 0.077 | 0.070 | 0.082 | 0.090 | 0.085 | 0.089 | 0.093 | 0.084 |
| No. of children age 0-14 years in the hhold | -0.023 | -0.025 | -0.021 | -0.022 | -0.018 | -0.017 | -0.020 | -0.022 |
| No. of male aged 15-59 years in the hhold | -0.003 | 0.002 | -0.004 | 0.003 | -0.003 | 0.002 | -0.003 | -0.005 |
| No. of females aged 15-59 years in the hhold | 0.009 | 0.008 | 0.006 | 0.010 | 0.009 | 0.007 | 0.010 | 0.014 |
| No. of elderly aged 60+ years in the hhold | -0.054 | -0.054 | -0.042 | -0.048 | -0.046 | -0.043 | -0.048 | -0.063 |
| | | | | | | | | |
| Observed probability | 0.619 | 0.620 | 0.625 | 0.637 | 0.629 | 0.639 | 0.630 | 0.639 |
| Predicted probability | 0.562 | 0.554 | 0.568 | 0.588 | 0.582 | 0.600 | 0.586 | 0.594 |
| Number of observations (weighted) | 28,972,900 | 28,980,876 | 29,275,810 | 29,415,136 | 29,655,345 | 29,764,915 | 29,976,511 | 30,142,687 |
| Chi$^2$ | 9,501,001 | 9,298,331 | 9,363,337 | 9,153,328 | 8,907,728 | 9,467,794 | 9,341,773 | 1.02E+07 |
| Pseudo R$^2$ | 0.238 | 0.232 | 0.232 | 0.227 | 0.219 | 0.233 | 0.227 | 0.248 |

Note: All explanatory variables are statistically significant at 1%.

Table A.1: Continued

| | QLFS 2008Q1 | QLFS 2008Q2 | QLFS 2008Q3 | QLFS 2008Q4 | QLFS 2009Q1 | QLFS 2009Q2 | QLFS 2009Q3 | QLFS 2009Q4 |
|---|---|---|---|---|---|---|---|---|
| | **Marginal fixed effects** | | | | | | | |
| Age: 15-24 years | -0.403 | -0.400 | -0.402 | -0.406 | -0.410 | -0.398 | -0.403 | -0.401 |
| Age: 35-44 years | 0.023 | 0.000 | 0.015 | 0.002 | 0.004 | 0.017 | 0.023 | 0.017 |
| Age: 45-54 years | -0.079 | -0.103 | -0.090 | -0.085 | -0.089 | -0.082 | -0.079 | -0.071 |
| Age: 55-65 years | -0.329 | -0.357 | -0.350 | -0.342 | -0.341 | -0.340 | -0.329 | -0.337 |
| Race: African | 0.093 | 0.111 | 0.108 | 0.127 | 0.098 | 0.089 | 0.093 | 0.074 |
| Race: Coloured | 0.125 | 0.124 | 0.126 | 0.144 | 0.134 | 0.111 | 0.125 | 0.117 |
| Race: Indian | 0.015 | 0.020 | 0.045 | 0.028 | 0.012 | 0.003 | 0.015 | -0.028 |
| ***Gender: Male*** | ***0.156*** | ***0.148*** | ***0.154*** | ***0.153*** | ***0.151*** | ***0.154*** | ***0.156*** | ***0.168*** |
| Province: WC | 0.165 | 0.142 | 0.122 | 0.121 | 0.128 | 0.118 | 0.165 | 0.156 |
| Province: NC | 0.048 | 0.061 | 0.063 | 0.078 | 0.052 | 0.037 | 0.048 | 0.082 |
| Province: FS | 0.115 | 0.111 | 0.083 | 0.068 | 0.078 | 0.051 | 0.115 | 0.104 |
| Province: KZN | 0.025 | 0.069 | 0.055 | 0.062 | 0.034 | -0.019 | 0.025 | 0.012 |
| Province: NW | 0.024 | 0.035 | 0.045 | 0.052 | 0.049 | 0.013 | 0.024 | 0.016 |
| Province: GAU | 0.162 | 0.181 | 0.170 | 0.157 | 0.152 | 0.137 | 0.162 | 0.166 |
| Province: MPU | 0.091 | 0.080 | 0.075 | 0.076 | 0.081 | 0.055 | 0.091 | 0.098 |
| Province: LIM | -0.045 | -0.042 | -0.047 | -0.063 | -0.063 | -0.100 | -0.045 | -0.035 |
| Education: Primary | 0.007 | 0.006 | 0.007 | 0.009 | 0.011 | 0.008 | 0.007 | 0.006 |
| Education: Secondary | 0.028 | 0.023 | 0.025 | 0.028 | 0.025 | 0.028 | 0.028 | 0.030 |
| Education: Matric | 0.170 | 0.184 | 0.186 | 0.173 | 0.164 | 0.171 | 0.170 | 0.184 |
| Education: Matric + Certificate/Diploma | 0.302 | 0.303 | 0.295 | 0.303 | 0.300 | 0.292 | 0.302 | 0.283 |
| Education: Degree | 0.300 | 0.285 | 0.278 | 0.284 | 0.281 | 0.286 | 0.300 | 0.322 |
| Household head | 0.186 | 0.194 | 0.193 | 0.192 | 0.194 | 0.203 | 0.186 | 0.194 |
| Marital Status: Married | 0.067 | 0.064 | 0.050 | 0.063 | 0.060 | 0.071 | 0.067 | 0.054 |
| No. of children age 0-14 years in the hhold | -0.027 | -0.024 | -0.029 | -0.029 | -0.030 | -0.031 | -0.027 | -0.026 |
| No. of male aged 15-59 years in the hhold | 0.000 | 0.010 | 0.009 | 0.003 | 0.009 | 0.008 | 0.000 | 0.000 |
| No. of females aged 15-59 years in the hhold | 0.024 | 0.015 | 0.020 | 0.019 | 0.021 | 0.025 | 0.024 | 0.025 |
| No. of elderly aged 60+ years in the hhold | -0.050 | -0.036 | -0.049 | -0.058 | -0.059 | -0.054 | -0.050 | -0.045 |
| | | | | | | | | |
| Observed probability | 0.658 | 0.655 | 0.652 | 0.646 | 0.648 | 0.636 | 0.617 | 0.622 |
| Predicted probability | 0.613 | 0.611 | 0.607 | 0.602 | 0.603 | 0.588 | 0.566 | 0.567 |
| Number of observations (weighted) | 30,474,437 | 30,556,604 | 30,655,929 | 30,763,819 | 30,893,959 | 30,990,038 | 31,001,486 | 31,134,894 |
| Chi$^2$ | 1.06E+07 | 1.07E+07 | 1.10E+07 | 1.12E+07 | 1.11E+07 | 1.14E+07 | 1.14E+07 | 1.15E+07 |
| Pseudo R$^2$ | 0.256 | 0.256 | 0.262 | 0.267 | 0.263 | 0.269 | 0.266 | 0.268 |

Note: All explanatory variables are statistically significant at 1%.

Table A.2: Two-step Heckprobit regressions on employment likelihood, 1995-2009

| | OHS1995 | OHS1996 | OHS1997 | OHS1998 | OHS1999 |
|---|---|---|---|---|---|
| | **Marginal fixed effects** | | | | |
| Age: 15-24 years | 0.012 | 0.042 | -0.079 | -0.032 | -0.011 |
| Age: 35-44 years | 0.030 | 0.023 | 0.047 | 0.065 | 0.032 |
| Age: 45-54 years | 0.044 | 0.061 | 0.058 | 0.071 | 0.071 |
| Age: 55-65 years | 0.094 | 0.125 | 0.091 | 0.130 | 0.134 |
| Race: African | -0.132 | -0.163 | -0.194 | -0.243 | -0.213 |
| Race: Coloured | -0.123 | -0.122 | -0.156 | -0.173 | -0.150 |
| Race: Indian | -0.084 | -0.079 | -0.081 | -0.179 | -0.159 |
| ***Gender: Male*** | ***-0.001*** | ***-0.010*** | ***0.033*** | ***0.008*** | ***-0.002*** |
| Province: WC | 0.026 | 0.051 | 0.099 | 0.114 | 0.051 |
| Province: NC | -0.010 | 0.078 | 0.049 | 0.088 | 0.031 |
| Province: FS | 0.052 | 0.012 | 0.060 | 0.086 | 0.008 |
| Province: KZN | 0.028 | 0.020 | 0.054 | 0.079 | 0.023 |
| Province: NW | 0.043 | 0.083 | 0.064 | 0.079 | 0.037 |
| Province: GAU | 0.016 | 0.005 | 0.038 | 0.063 | 0.019 |
| Province: MPU | 0.048 | 0.079 | 0.043 | 0.075 | 0.019 |
| Province: LIM | 0.030 | 0.012 | 0.020 | 0.008 | -0.048 |
| Education: Primary | -0.004 | -0.007 | -0.006 | -0.010 | -0.007 |
| Education: Secondary | -0.002 | 0.004 | 0.005 | 0.001 | -0.005 |
| Education: Matric | 0.002 | -0.006 | 0.025 | 0.016 | 0.011 |
| Education: Matric + Certificate/Diploma | 0.077 | 0.093 | 0.110 | 0.118 | 0.095 |
| Education: Degree | 0.089 | 0.070 | 0.110 | 0.127 | 0.124 |
| Marital Status: Married | 0.068 | 0.067 | 0.072 | 0.087 | 0.078 |
| Household head | 0.096 | 0.050 | 0.142 | 0.141 | 0.161 |
| Lambda | -0.128 | -0.199 | -0.006 | -0.082 | -0.098 |
| | | | | | |
| Observed probability | 0.609 | 0.594 | 0.609 | 0.601 | 0.580 |
| Predicted probability | 0.882 | 0.858 | 0.846 | 0.807 | 0.820 |
| Number of observations (weighted) | 11,435,096 | 11,070,802 | 11,507,643 | 12,486,043 | 13,207,215 |
| Chi$^2$ | 2,152,211 | 2,084,308 | 2,181,905 | 2,759,369 | 2,789,772 |
| Pseudo R$^2$ | 0.202 | 0.189 | 0.183 | 0.196 | 0.193 |

Note: All explanatory variables are statistically significant at 1%.

Table A.2: Continued

| | LFS2000a | LFS2000b | LFS2001a | LFS2001b | LFS2002a | LFS2002b | LFS2003a | LFS2003b |
|---|---|---|---|---|---|---|---|---|
| | Marginal fixed effects | | | | | | | |
| Age: 15-24 years | -0.169 | -0.121 | -0.156 | -0.072 | -0.149 | -0.122 | -0.128 | -0.106 |
| Age: 35-44 years | 0.048 | 0.052 | 0.063 | 0.065 | 0.064 | 0.061 | 0.064 | 0.051 |
| Age: 45-54 years | 0.049 | 0.062 | 0.057 | 0.089 | 0.055 | 0.061 | 0.074 | 0.078 |
| Age: 55-65 years | 0.051 | 0.088 | 0.073 | 0.105 | 0.074 | 0.106 | 0.115 | 0.106 |
| Race: African | -0.211 | -0.193 | -0.195 | -0.263 | -0.246 | -0.268 | -0.265 | -0.253 |
| Race: Coloured | -0.153 | -0.131 | -0.136 | -0.221 | -0.238 | -0.213 | -0.198 | -0.196 |
| Race: Indian | -0.173 | -0.122 | -0.160 | -0.169 | -0.139 | -0.189 | -0.171 | -0.158 |
| *Gender: Male* | *0.015* | *0.018* | *-0.006* | *0.002* | *0.023* | *0.032* | *0.014* | *0.001* |
| Province: WC | 0.026 | 0.039 | 0.057 | 0.052 | 0.024 | 0.058 | 0.037 | 0.041 |
| Province: NC | -0.066 | 0.006 | -0.017 | -0.012 | -0.102 | 0.006 | -0.072 | -0.031 |
| Province: FS | 0.019 | -0.011 | -0.003 | -0.016 | -0.120 | 0.005 | -0.046 | -0.003 |
| Province: KZN | -0.046 | 0.001 | 0.049 | -0.022 | -0.127 | 0.003 | -0.051 | 0.009 |
| Province: NW | -0.095 | -0.038 | 0.015 | 0.010 | -0.086 | 0.018 | -0.032 | 0.027 |
| Province: GAU | -0.074 | -0.025 | 0.005 | -0.038 | -0.108 | -0.022 | -0.067 | -0.021 |
| Province: MPU | -0.059 | 0.001 | 0.044 | 0.018 | -0.071 | 0.025 | -0.014 | 0.050 |
| Province: LIM | -0.031 | -0.045 | -0.020 | -0.048 | -0.161 | -0.029 | -0.110 | -0.010 |
| Education: Primary | -0.010 | -0.004 | -0.006 | -0.004 | -0.011 | -0.009 | -0.006 | -0.005 |
| Education: Secondary | -0.007 | -0.006 | -0.005 | -0.007 | -0.008 | -0.004 | -0.008 | -0.007 |
| Education: Matric | 0.059 | 0.054 | 0.051 | 0.055 | 0.075 | 0.065 | 0.055 | 0.060 |
| Education: Matric + Certificate/Diploma | 0.146 | 0.125 | 0.152 | 0.154 | 0.171 | 0.172 | 0.180 | 0.139 |
| Education: Degree | 0.161 | 0.173 | 0.166 | 0.183 | 0.205 | 0.203 | 0.193 | 0.194 |
| Marital Status: Married | 0.124 | 0.101 | 0.130 | 0.113 | 0.132 | 0.114 | 0.124 | 0.110 |
| Household head | 0.253 | 0.250 | 0.253 | 0.247 | 0.264 | 0.249 | 0.254 | 0.241 |
| Lambda | 0.231 | 0.106 | 0.148 | -0.003 | 0.111 | 0.044 | 0.017 | -0.004 |
| | | | | | | | | |
| Observed probability | 0.530 | 0.567 | 0.553 | 0.576 | 0.569 | 0.586 | 0.577 | 0.579 |
| Predicted probability | 0.777 | 0.800 | 0.785 | 0.762 | 0.758 | 0.751 | 0.743 | 0.783 |
| Number of observations (weighted) | 16,000,132 | 16,197,021 | 16,494,752 | 15,638,759 | 16,331,121 | 16,036,716 | 16,275,187 | 15,741,526 |
| Chi$^2$ | 3,055,189 | 3,426,694 | 3,542,522 | 4,012,162 | 4,088,821 | 4,048,420 | 4,401,240 | 4,137,664 |
| Pseudo R$^2$ | 0.164 | 0.186 | 0.186 | 0.211 | 0.206 | 0.205 | 0.217 | 0.222 |

Note: All explanatory variables are statistically significant at 1%.

Table A.2: Continued

| | LFS2004a | LFS2004b | LFS2005a | LFS2005b | LFS2006a | LFS2006b | LFS2007a | LFS2007b |
|---|---|---|---|---|---|---|---|---|
| | **Marginal fixed effects** | | | | | | | |
| Age: 15-24 years | -0.113 | -0.038 | -0.048 | -0.073 | -0.111 | -0.049 | -0.082 | -0.060 |
| Age: 35-44 years | 0.053 | 0.042 | 0.073 | 0.045 | 0.045 | 0.028 | 0.058 | 0.040 |
| Age: 45-54 years | 0.062 | 0.087 | 0.107 | 0.077 | 0.076 | 0.075 | 0.081 | 0.056 |
| Age: 55-65 years | 0.113 | 0.143 | 0.142 | 0.123 | 0.119 | 0.141 | 0.141 | 0.108 |
| Race: African | -0.258 | -0.213 | -0.213 | -0.224 | -0.207 | -0.212 | -0.213 | -0.182 |
| Race: Coloured | -0.185 | -0.187 | -0.168 | -0.238 | -0.199 | -0.204 | -0.203 | -0.216 |
| Race: Indian | -0.186 | -0.085 | -0.152 | -0.135 | -0.085 | -0.064 | -0.159 | -0.049 |
| ***Gender: Male*** | ***0.020*** | ***-0.009*** | ***0.013*** | ***0.024*** | ***0.035*** | ***0.023*** | ***0.040*** | ***0.006*** |
| Province: WC | 0.079 | 0.040 | 0.025 | 0.062 | 0.017 | 0.086 | 0.040 | 0.043 |
| Province: NC | 0.023 | -0.010 | -0.086 | 0.011 | -0.074 | -0.022 | -0.060 | -0.037 |
| Province: FS | 0.042 | -0.030 | -0.069 | -0.030 | -0.117 | 0.011 | -0.029 | -0.027 |
| Province: KZN | 0.024 | 0.001 | -0.041 | -0.016 | -0.086 | 0.045 | -0.015 | -0.030 |
| Province: NW | 0.022 | 0.003 | -0.026 | 0.012 | -0.123 | 0.008 | -0.052 | 0.003 |
| Province: GAU | 0.009 | -0.013 | -0.008 | 0.020 | -0.067 | 0.030 | -0.001 | 0.022 |
| Province: MPU | 0.067 | 0.035 | -0.011 | 0.024 | -0.075 | 0.022 | -0.014 | 0.013 |
| Province: LIM | 0.005 | 0.015 | -0.054 | -0.026 | -0.189 | -0.006 | -0.075 | -0.032 |
| Education: Primary | -0.010 | -0.012 | -0.003 | -0.007 | 0.001 | -0.005 | -0.004 | -0.011 |
| Education: Secondary | -0.011 | -0.006 | -0.011 | -0.004 | -0.006 | -0.006 | -0.010 | -0.003 |
| Education: Matric | 0.050 | 0.032 | 0.049 | 0.035 | 0.052 | 0.028 | 0.058 | 0.038 |
| Education: Matric + Certificate/Diploma | 0.160 | 0.140 | 0.140 | 0.144 | 0.130 | 0.118 | 0.148 | 0.100 |
| Education: Degree | 0.174 | 0.174 | 0.185 | 0.181 | 0.171 | 0.151 | 0.163 | 0.150 |
| Marital Status: Married | 0.108 | 0.101 | 0.073 | 0.093 | 0.113 | 0.089 | 0.072 | 0.081 |
| Household head | 0.224 | 0.191 | 0.188 | 0.214 | 0.208 | 0.180 | 0.188 | 0.157 |
| Lambda | 0.001 | -0.082 | 0.071 | -0.022 | 0.034 | -0.081 | 0.034 | -0.065 |
| | | | | | | | | |
| Observed probability | 0.583 | 0.582 | 0.581 | 0.574 | 0.571 | 0.572 | 0.575 | 0.566 |
| Predicted probability | 0.784 | 0.795 | 0.793 | 0.791 | 0.809 | 0.804 | 0.804 | 0.833 |
| Number of observations (weighted) | 15,715,605 | 15,571,274 | 16,047,122 | 16,615,892 | 16,626,434 | 17,039,786 | 16,865,542 | 17,037,803 |
| Chi$^2$ | 4,203,456 | 3,674,932 | 3,810,401 | 3,865,792 | 3,993,164 | 3,866,285 | 3,869,612 | 3,582,661 |
| Pseudo R$^2$ | 0.226 | 0.205 | 0.205 | 0.200 | 0.211 | 0.199 | 0.202 | 0.196 |

Note: All explanatory variables are statistically significant at 1%.

Table A.2: Continued

| | QLFS 2008Q1 | QLFS 2008Q2 | QLFS 2008Q3 | QLFS 2008Q4 | QLFS 2009Q1 | QLFS 2009Q2 | QLFS 2009Q3 | QLFS 2009Q4 |
|---|---|---|---|---|---|---|---|---|
| | **Marginal fixed effects** | | | | | | | |
| Age: 15-24 years | -0.121 | -0.106 | -0.111 | -0.089 | -0.129 | -0.110 | -0.100 | -0.080 |
| Age: 35-44 years | 0.048 | 0.046 | 0.035 | 0.046 | 0.057 | 0.053 | 0.052 | 0.048 |
| Age: 45-54 years | 0.085 | 0.087 | 0.094 | 0.078 | 0.090 | 0.086 | 0.091 | 0.094 |
| Age: 55-65 years | 0.096 | 0.083 | 0.108 | 0.120 | 0.113 | 0.142 | 0.135 | 0.133 |
| Race: African | -0.180 | -0.174 | -0.189 | -0.186 | -0.178 | -0.182 | -0.193 | -0.193 |
| Race: Coloured | -0.138 | -0.160 | -0.168 | -0.210 | -0.162 | -0.147 | -0.151 | -0.160 |
| Race: Indian | -0.098 | -0.128 | -0.131 | -0.167 | -0.123 | -0.121 | -0.159 | -0.142 |
| ***Gender: Male*** | ***0.031*** | ***0.035*** | ***0.022*** | ***0.027*** | ***0.023*** | ***0.004*** | ***-0.001*** | ***-0.009*** |
| Province: WC | 0.046 | 0.020 | 0.021 | 0.036 | 0.060 | 0.022 | -0.016 | -0.013 |
| Province: NC | -0.007 | -0.023 | 0.013 | 0.008 | -0.006 | -0.008 | -0.067 | -0.005 |
| Province: FS | 0.010 | -0.025 | 0.016 | 0.002 | 0.012 | -0.013 | -0.034 | -0.006 |
| Province: KZN | 0.053 | 0.042 | 0.059 | 0.050 | 0.067 | 0.082 | 0.084 | 0.081 |
| Province: NW | 0.039 | 0.004 | -0.005 | -0.016 | 0.006 | -0.003 | -0.025 | -0.018 |
| Province: GAU | 0.014 | -0.004 | 0.010 | -0.005 | 0.023 | 0.000 | -0.036 | -0.043 |
| Province: MPU | 0.038 | 0.000 | 0.032 | 0.011 | 0.033 | 0.012 | 0.012 | -0.005 |
| Province: LIM | -0.037 | -0.062 | -0.033 | -0.038 | -0.007 | 0.022 | 0.010 | 0.001 |
| Education: Primary | -0.003 | 0.002 | -0.005 | -0.007 | -0.001 | 0.003 | -0.001 | 0.002 |
| Education: Secondary | -0.003 | v-0.005 | -0.003 | -0.001 | -0.007 | -0.003 | -0.003 | -0.008 |
| Education: Matric | 0.057 | 0.059 | 0.047 | 0.032 | 0.063 | 0.036 | 0.059 | 0.047 |
| Education: Matric + Certificate/Diploma | 0.133 | 0.133 | 0.122 | 0.112 | 0.134 | 0.116 | 0.132 | 0.127 |
| Education: Degree | 0.148 | 0.163 | 0.157 | 0.142 | 0.163 | 0.157 | 0.170 | 0.154 |
| Marital Status: Married | 0.057 | 0.078 | 0.071 | 0.068 | 0.082 | 0.072 | 0.074 | 0.086 |
| Household head | 0.152 | 0.156 | 0.145 | 0.128 | 0.154 | 0.132 | 0.148 | 0.131 |
| Lambda | 0.008 | 0.020 | -0.005 | -0.025 | 0.029 | -0.017 | -0.011 | 0.043 |
| | | | | | | | | |
| Observed probability | 0.560 | 0.561 | 0.558 | 0.560 | 0.555 | 0.553 | 0.551 | 0.554 |
| Predicted probability | 0.810 | 0.819 | 0.820 | 0.836 | 0.818 | 0.814 | 0.802 | 0.805 |
| Number of observations (weighted) | 1.8E+07 | 17,650,343 | 17,603,043 | 17,540,563 | 17,668,955 | 17,354,655 | 16,888,586 | 16,966,698 |
| Chi$^2$ | 2,972,465 | 3,048,895 | 3,181,205 | 3,154,624 | 3,331,036 | 3,099,458 | 3,043,682 | 3,053,158 |
| Pseudo R$^2$ | 0.154 | 0.160 | 0.167 | 0.171 | 0.173 | 0.163 | 0.161 | 0.162 |

Note: All explanatory variables are statistically significant at 1%.

Table A.3: Three-step Heckman regressions on log hourly wage (2000 prices) of employed, 1995-2007

| | OHS1995 | OHS1996 | OHS1997 | OHS1998 | OHS1999 |
|---|---|---|---|---|---|
| | Coefficient | | | | |
| Race: African | -0.574*** | -0.550*** | -0.561*** | -0.557*** | -0.614*** |
| Race: Coloured | -0.381*** | -0.402*** | -0.403*** | -0.349*** | -0.414*** |
| Race: Indian | -0.247*** | -0.279*** | -0.272*** | -0.148*** | -0.157*** |
| ***Gender: Male*** | ***0.184***** | ***0.218***** | ***0.190***** | ***0.202***** | ***0.167***** |
| Province: WC | 0.094*** | 0.191*** | 0.153*** | 0.261*** | 0.467*** |
| Province: NC | -0.097*** | -0.117*** | -0.084*** | -0.070*** | 0.169*** |
| Province: FS | -0.317*** | -0.094*** | -0.146*** | -0.336*** | -0.183*** |
| Province: KZN | 0.116*** | 0.029 | 0.114*** | 0.061*** | 0.226*** |
| Province: NW | 0.047*** | 0.044 | -0.041*** | 0.001*** | 0.181*** |
| Province: GAU | 0.259*** | 0.248*** | 0.296*** | 0.442*** | 0.431*** |
| Province: MPU | 0.071*** | -0.120*** | -0.064* | 0.060 | 0.225*** |
| Province: LIM | 0.196*** | -0.096*** | -0.140*** | -0.178*** | 0.247*** |
| Education: Primary | 0.020*** | 0.026*** | 0.034*** | 0.021*** | 0.035*** |
| Education: Secondary | 0.099*** | 0.111*** | 0.073*** | 0.082*** | 0.081*** |
| Education: Matric | 0.192*** | 0.222*** | 0.192*** | 0.206*** | 0.170*** |
| Education: Matric +Certificate/diploma | 0.422*** | 0.510*** | 0.440*** | 0.479*** | 0.487*** |
| Education: Degree | 0.650*** | 0.726*** | 0.611*** | 0.652*** | 0.599*** |
| Marital Status: Married | 0.094*** | 0.095*** | 0.032** | 0.083*** | 0.092*** |
| Household head | 0.211*** | 0.141*** | 0.101*** | 0.031 | 0.104*** |
| Years of experience | 0.033*** | 0.035*** | 0.024*** | 0.030*** | 0.027*** |
| Years of experience squared | 0.000*** | 0.000*** | 0.000*** | 0.000*** | 0.000*** |
| Occupation: Manager | 0.653*** | 0.592*** | 0.484*** | 0.560*** | 0.564*** |
| Occupation: Professionals | 0.512*** | 0.514*** | 0.479*** | 0.608*** | 0.578*** |
| Occupation: Professionals and Technicians | 0.521*** | 0.465*** | 0.361*** | 0.456*** | 0.434*** |
| Occupation: Clerk | 0.260*** | 0.294*** | 0.256*** | 0.266*** | 0.253*** |
| Occupation: Service | 0.120*** | 0.069* | 0.065*** | 0.084** | 0.026*** |
| Occupation: Skilled agricultural workers | 0.652*** | 0.194*** | 0.209*** | 0.077 | 0.088*** |
| Occupation: Trade | 0.199*** | 0.107*** | 0.165*** | 0.189*** | 0.198*** |
| Occupation: Operators | 0.124*** | 0.173*** | 0.131*** | 0.165*** | 0.105*** |
| Occupation: Domestic | -0.858*** | -0.006 | -0.107*** | -0.254*** | -0.322*** |
| Occupation: Other | 0.487 | 0.211 | 0.285 | 0.294 | 0.321 |
| Industry: Mining | 0.609*** | 0.852*** | 0.876*** | 0.757*** | 0.746*** |
| Industry: Manufacturing | 0.639*** | 0.731*** | 0.850*** | 0.844*** | 0.745*** |
| Industry: Electricity, Water and Gas | 0.747*** | 0.790*** | 0.941*** | 1.100*** | 1.008*** |
| Industry: Construction | 0.552*** | 0.625*** | 0.869*** | 0.903*** | 0.701*** |
| Industry: Wholesale and Retail | 0.543*** | 0.593*** | 0.720*** | 0.735*** | 0.575*** |
| Industry: Transport , Storage and Communications | 0.695*** | 0.710*** | 0.893*** | 0.881*** | 0.781*** |
| Industry:  Financial and Business services | 0.662*** | 0.682*** | 0.873*** | 0.841*** | 0.810*** |
| Industry:  Personal and Social services | 0.514*** | 0.592*** | 0.670*** | 0.702*** | 0.690*** |
| Industry: Private services | 0.149*** | 0.252*** | 0.447*** | 0.532*** | 0.512*** |
| Industry: Other | 0.673*** | 0.556*** | 0.697*** | 0.957*** | 0.768*** |
| Self-employed | 0.611*** | 0.542*** | 0.441*** | 0.438*** | 0.181*** |
| Public sector workers | 0.216*** | -0.507*** | -0.406*** | -0.430*** | -0.369*** |
| Informal sector workers | -0.335*** | 0.262*** | 0.299*** | 0.251*** | 0.189*** |
| Union member | 0.151*** | 0.241*** | 0.159*** | 0.289*** | 0.247*** |
| Lambda | 0.242 | 0.047 | -0.091 | -0.048 | -0.088 |
| Constant | 0.559 | 0.282 | 0.528 | 0.322 | 0.290 |
| | | | | | |
| R-squared | 0.642 | 0.489 | 0.4974 | 0.531 | 0.489 |
| Adjusted R-squared | 0.642 | 0.488 | 0.4964 | 0.529 | 0.488 |
| Number of observations (weighted) | 9,499,347 | 8,966,307 | 9,093,647 | 9,370,130 | 10,356,143 |

*** Significant at 1%        ** Significant at 5%        * Significant at 10%

Table A.3: Continued

| | LFS 2000a | LFS 2000b | LFS 2001a | LFS 2001b | LFS 2002a |
|---|---|---|---|---|---|
| | Coefficient | | | | |
| Race: African | -0.801*** | -0.635*** | -0.701*** | -0.638*** | -0.709*** |
| Race: Coloured | -0.617*** | -0.355*** | -0.385*** | -0.333*** | -0.394*** |
| Race: Indian | -0.292*** | -0.234*** | -0.204*** | -0.223*** | -0.281*** |
| ***Gender: Male*** | ***0.159**** | ***0.135**** | ***0.185**** | ***0.179**** | ***0.152**** |
| Province: WC | 0.410*** | 0.248*** | 0.387*** | 0.356*** | 0.373*** |
| Province: NC | 0.195 | -0.053 | 0.074 | 0.117 | 0.056 |
| Province: FS | -0.069 | -0.201 | -0.140 | -0.024 | 0.024 |
| Province: KZN | 0.137*** | 0.119*** | 0.133*** | 0.231*** | 0.213*** |
| Province: NW | 0.076 | 0.105*** | 0.151*** | 0.127*** | 0.187*** |
| Province: GAU | 0.335*** | 0.266*** | 0.392*** | 0.450*** | 0.475*** |
| Province: MPU | 0.084* | 0.123*** | 0.205*** | 0.162*** | 0.232*** |
| Province: LIM | 0.012 | -0.036 | 0.000 | -0.03 | -0.043 |
| Education: Primary | 0.013* | 0.033*** | 0.025*** | 0.038*** | 0.035*** |
| Education: Secondary | 0.098*** | 0.067*** | 0.085*** | 0.081*** | 0.075*** |
| Education: Matric | 0.198*** | 0.202*** | 0.173*** | 0.173*** | 0.170*** |
| Education: Matric +Certificate/diploma | 0.542*** | 0.460*** | 0.420*** | 0.414*** | 0.442*** |
| Education: Degree | 0.721*** | 0.664*** | 0.557*** | 0.668*** | 0.633*** |
| Marital Status: Married | 0.149*** | 0.080*** | 0.078*** | 0.046*** | 0.051** |
| Household head | 0.182*** | 0.099*** | 0.103*** | -0.005 | 0.056*** |
| Years of experience | 0.031*** | 0.022*** | 0.028*** | 0.028*** | 0.023*** |
| Years of experience squared | 0.000*** | 0.000*** | 0.000*** | 0.000*** | 0.000*** |
| Occupation: Manager | 0.540*** | 0.669*** | 0.858*** | 0.754*** | 0.816*** |
| Occupation: Professionals | 0.508*** | 0.547*** | 0.690*** | 0.585*** | 0.626*** |
| Occupation: Professionals and Technicians | 0.355*** | 0.486*** | 0.556*** | 0.529*** | 0.566*** |
| Occupation: Clerk | 0.243*** | 0.326*** | 0.436*** | 0.373*** | 0.344*** |
| Occupation: Service | -0.066** | 0.003** | 0.107** | 0.077** | 0.036** |
| Occupation: Skilled agricultural workers | 0.167*** | 0.165*** | 0.317*** | 0.568*** | 0.278*** |
| Occupation: Trade | 0.104*** | 0.216*** | 0.243*** | 0.257*** | 0.208*** |
| Occupation: Operators | 0.055*** | 0.186*** | 0.181*** | 0.136*** | 0.173*** |
| Occupation: Domestic | -0.171 | -0.115** | 0.077 | 0.227*** | -0.167*** |
| Occupation: Other | 0.408 | 0.432 | 0.286 | -0.385 | 0.278 |
| Industry: Mining | 0.799*** | 0.876*** | 0.761*** | 0.851*** | 0.806*** |
| Industry: Manufacturing | 0.719*** | 0.704*** | 0.623*** | 0.707*** | 0.698*** |
| Industry: Electricity, Water and Gas | 0.862*** | 1.093*** | 0.872*** | 0.820*** | 0.773*** |
| Industry: Construction | 0.770*** | 0.697*** | 0.635*** | 0.695*** | 0.670*** |
| Industry: Wholesale and Retail | 0.612*** | 0.585*** | 0.403*** | 0.484*** | 0.483*** |
| Industry: Transport , Storage and Communications | 0.824*** | 0.872*** | 0.725*** | 0.739*** | 0.699*** |
| Industry:  Financial and Business services | 0.722*** | 0.823*** | 0.734*** | 0.671*** | 0.700*** |
| Industry:  Personal and Social services | 0.671**** | 0.714*** | 0.589*** | 0.602*** | 0.679*** |
| Industry: Private services | 0.261*** | 0.337*** | 0.154*** | -0.043 | 0.303*** |
| Industry: Other | 0.495*** | 0.756*** | 0.867*** | 0.804*** | 0.906*** |
| Self-employed | 0.156*** | 0.181*** | 0.087*** | 0.146*** | 0.134*** |
| Public sector workers | -0.480*** | -0.404*** | -0.443*** | -0.481*** | -0.537*** |
| Informal sector workers | 0.222*** | 0.261*** | 0.311*** | 0.284*** | 0.247*** |
| Union member | 0.237*** | 0.262*** | 0.258*** | 0.263*** | 0.276*** |
| Lambda | 0.334* | -0.264* | -0.081** | -0.264* | -0.136** |
| Constant | 0.263 | 0.588 | 0.375 | 0.417 | 0.432 |
| | | | | | |
| R-squared | 0.559 | 0.575 | 0.602 | 0.626 | 0.647 |
| Adjusted R-squared | 0.556 | 0.574 | 0.601 | 0.625 | 0.646 |
| Number of observations (weighted) | 11,874,409 | 12,224,406 | 12,260,207 | 11,167,541 | 11,603,398 |

*** Significant at 1%        ** Significant at 5%        * Significant at 10%

Table A.3: Continued

| | LFS 2002b | LFS 2003a | LFS 2003b | LFS 2004a | LFS 2004b |
|---|---|---|---|---|---|
| | Coefficient | | | | |
| Race: African | -0.690*** | -0.626*** | -0.734*** | -0.692*** | -0.631*** |
| Race: Coloured | -0.408*** | -0.340*** | -0.440*** | -0.377*** | -0.351*** |
| Race: Indian | -0.262*** | -0.239*** | -0.285*** | -0.161*** | -0.253*** |
| *Gender: Male* | *0.150\*\*\** | *0.166\*\*\** | *0.156\*\*\** | *0.153\*\*\** | *0.195\*\*\** |
| Province: WC | 0.368*** | 0.332*** | 0.343*** | 0.336*** | 0.285*** |
| Province: NC | 0.131 | 0.146 | 0.045 | 0.010 | 0.014 |
| Province: FS | -0.113 | -0.015 | -0.079 | -0.003 | -0.068 |
| Province: KZN | 0.181*** | 0.181*** | 0.201*** | 0.168*** | 0.161*** |
| Province: NW | 0.151*** | 0.157*** | 0.117*** | 0.182*** | 0.088*** |
| Province: GAU | 0.369*** | 0.415*** | 0.391*** | 0.454*** | 0.341*** |
| Province: MPU | 0.146*** | 0.170*** | 0.121*** | 0.168*** | 0.044*** |
| Province: LIM | -0.053 | -0.031 | -0.016 | -0.025 | -0.101 |
| Education: Primary | 0.023*** | 0.028*** | 0.025*** | 0.020*** | 0.025*** |
| Education: Secondary | 0.084*** | 0.074*** | 0.076*** | 0.069*** | 0.072*** |
| Education: Matric | 0.181*** | 0.189*** | 0.206*** | 0.202*** | 0.195*** |
| Education: Matric +Certificate/diploma | 0.485*** | 0.518*** | 0.502*** | 0.467*** | 0.475*** |
| Education: Degree | 0.684*** | 0.601*** | 0.679*** | 0.715*** | 0.655*** |
| Marital Status: Married | 0.084*** | 0.099*** | 0.106*** | 0.092*** | 0.077*** |
| Household head | 0.100*** | 0.075*** | 0.090*** | 0.068*** | 0.009 |
| Years of experience | 0.023*** | 0.023*** | 0.021*** | 0.022*** | 0.025*** |
| Years of experience squared | 0.000*** | 0.000*** | 0.000*** | 0.000*** | 0.000*** |
| Occupation: Manager | 0.824*** | 0.891*** | 0.845*** | 0.873*** | 0.878*** |
| Occupation: Professionals | 0.621*** | 0.702*** | 0.635*** | 0.684*** | 0.719*** |
| Occupation: Professionals and Technicians | 0.580*** | 0.576*** | 0.528*** | 0.562*** | 0.550*** |
| Occupation: Clerk | 0.415*** | 0.428*** | 0.350*** | 0.409*** | 0.416*** |
| Occupation: Service | 0.018** | 0.073** | 0.041** | 0.113** | 0.079** |
| Occupation: Skilled agricultural workers | 0.366*** | 0.424*** | 0.264*** | 0.245*** | 0.060 |
| Occupation: Trade | 0.248*** | 0.281*** | 0.255*** | 0.291*** | 0.228*** |
| Occupation: Operators | 0.152*** | 0.172*** | 0.177*** | 0.157*** | 0.156*** |
| Occupation: Domestic | -0.074*** | -0.400*** | -0.488*** | -0.498*** | -0.337*** |
| Occupation: Other | 0.332 | 0.323 | 0.248 | 0.539 | 0.091 |
| Industry: Mining | 0.905*** | 0.797** | 0.713*** | 0.789*** | 0.816*** |
| Industry: Manufacturing | 0.730*** | 0.640*** | 0.540*** | 0.545*** | 0.484*** |
| Industry: Electricity, Water and Gas | 0.788*** | 0.939*** | 0.833*** | 0.813*** | 0.703*** |
| Industry: Construction | 0.672*** | 0.609*** | 0.482*** | 0.546*** | 0.474*** |
| Industry: Wholesale and Retail | 0.520*** | 0.428*** | 0.333*** | 0.292*** | 0.271*** |
| Industry: Transport , Storage and Communications | 0.712*** | 0.689*** | 0.541*** | 0.630*** | 0.600*** |
| Industry:  Financial and Business services | 0.785*** | 0.760*** | 0.614*** | 0.598*** | 0.529*** |
| Industry:  Personal and Social services | 0.618*** | 0.633*** | 0.525*** | 0.532*** | 0.423*** |
| Industry: Private services | 0.257*** | 0.639*** | 0.591*** | 0.667*** | 0.483*** |
| Industry: Other | 0.665*** | 0.707*** | 0.635*** | 0.455*** | 0.551*** |
| Self-employed | 0.101*** | 0.105*** | 0.134*** | 0.106*** | 0.153*** |
| Public sector workers | -0.498*** | -0.494*** | -0.548*** | -0.549*** | -0.472*** |
| Informal sector workers | 0.368*** | 0.269*** | 0.336*** | 0.333*** | 0.320*** |
| Union member | 0.260*** | 0.280*** | 0.262*** | 0.271*** | 0.312*** |
| Lambda | -0.033 | -0.080 | -0.025 | -0.075 | -0.134** |
| Constant | 0.333 | 0.331 | 0.641 | 0.619 | 0.719 |
| | | | | | |
| R-squared | 0.643 | 0.631 | 0.645 | 0.650 | 0.616 |
| Adjusted R-squared | 0.642 | 0.631 | 0.644 | 0.649 | 0.615 |
| Number of observations (weighted) | 11,283,924 | 11,297,621 | 11,411,351 | 11,378,217 | 11,630,196 |

*** Significant at 1%     ** Significant at 5%     * Significant at 10%

Table A.3: Continued

| | LFS 2005a | LFS 2005b | LFS 2006a | LFS 2006b | LFS 2007a | LFS 2007b |
|---|---|---|---|---|---|---|
| | **Coefficient** | | | | | |
| Race: African | -0.643*** | -0.573*** | -0.654*** | -0.632*** | -0.645*** | -0.726*** |
| Race: Coloured | -0.409*** | -0.332*** | -0.312*** | -0.372*** | -0.335*** | -0.376*** |
| Race: Indian | -0.042 | -0.094*** | -0.243*** | -0.165*** | -0.169*** | -0.111*** |
| ***Gender: Male*** | ***0.166***** | ***0.206***** | ***0.167***** | ***0.163***** | ***0.165***** | ***0.192***** |
| Province: WC | 0.346*** | 0.268*** | 0.198*** | 0.317*** | 0.316*** | 0.261*** |
| Province: NC | 0.053 | 0.004 | -0.060 | -0.013 | 0.020 | 0.047 |
| Province: FS | -0.037 | -0.097 | -0.073 | -0.014 | -0.092 | 0.011 |
| Province: KZN | 0.110*** | -0.102*** | 0.078*** | 0.123*** | 0.134*** | 0.061*** |
| Province: NW | 0.110*** | 0.007 | -0.028 | 0.082*** | 0.062*** | 0.087*** |
| Province: GAU | 0.332*** | 0.246*** | 0.253*** | 0.315*** | 0.293*** | 0.381*** |
| Province: MPU | 0.064*** | -0.011 | 0.075*** | 0.092*** | 0.083*** | 0.097*** |
| Province: LIM | -0.134 | -0.188 | -0.172 | -0.115 | -0.094 | -0.107 |
| Education: Primary | 0.028*** | 0.017*** | 0.027*** | 0.023*** | 0.026*** | 0.016*** |
| Education: Secondary | 0.067*** | 0.066*** | 0.063*** | 0.059*** | 0.068*** | 0.069*** |
| Education: Matric | 0.227*** | 0.228*** | 0.152*** | 0.214*** | 0.234*** | 0.157*** |
| Education: Matric +Certificate/diploma | 0.579*** | 0.459*** | 0.419*** | 0.616*** | 0.577*** | 0.604*** |
| Education: Degree | 0.742*** | 0.829*** | 0.780*** | 0.890*** | 0.911*** | 1.112*** |
| Marital Status: Married | 0.053*** | 0.064*** | 0.089*** | 0.070*** | 0.075*** | 0.102*** |
| Household head | 0.066*** | 0.067*** | 0.051** | 0.031 | 0.049** | 0.153*** |
| Years of experience | 0.022*** | 0.023*** | 0.017*** | 0.018*** | 0.024*** | 0.019*** |
| Years of experience squared | 0.000*** | 0.000*** | 0.000*** | 0.000*** | 0.000*** | 0.000*** |
| Occupation: Manager | 0.805*** | 0.831*** | 0.830*** | 0.903*** | 0.876*** | 0.743*** |
| Occupation: Professionals | 0.698*** | 0.755*** | 0.714*** | 0.558*** | 0.596*** | 0.534*** |
| Occupation: Professionals and Technicians | 0.553*** | 0.595*** | 0.571*** | 0.483*** | 0.484*** | 0.511*** |
| Occupation: Clerk | 0.412*** | 0.452*** | 0.424*** | 0.356*** | 0.416*** | 0.420*** |
| Occupation: Service | 0.085** | 0.026** | 0.038** | 0.040** | 0.039** | 0.039** |
| Occupation: Skilled agricultural workers | 0.188*** | 0.358*** | 0.348*** | 0.319*** | 0.268*** | 0.211*** |
| Occupation: Trade | 0.232*** | 0.213*** | 0.260*** | 0.257*** | 0.270*** | 0.249*** |
| Occupation: Operators | 0.163*** | 0.183*** | 0.202*** | 0.151*** | 0.157*** | 0.176*** |
| Occupation: Domestic | -0.382*** | -0.361*** | -0.367*** | -0.322*** | -0.364*** | -0.266*** |
| Occupation: Other | 0.095 | 1.552 | 0.137 | 1.334 | 0.091 | 0.178 |
| Industry: Mining | 0.855*** | 0.764*** | 0.825*** | 0.844*** | 0.731*** | 0.826*** |
| Industry: Manufacturing | 0.486*** | 0.492*** | 0.468*** | 0.466*** | 0.424*** | 0.463*** |
| Industry: Electricity, Water and Gas | 0.602*** | 0.546*** | 0.851*** | 0.697*** | 0.713*** | 0.811*** |
| Industry: Construction | 0.501*** | 0.390*** | 0.471*** | 0.412*** | 0.391*** | 0.410*** |
| Industry: Wholesale and Retail | 0.266*** | 0.213*** | 0.316*** | 0.228*** | 0.227*** | 0.263*** |
| Industry: Transport , Storage and Communications | 0.492*** | 0.475*** | 0.557*** | 0.505*** | 0.458*** | 0.541*** |
| Industry: Financial and Business services | 0.510*** | 0.477*** | 0.574*** | 0.419*** | 0.390*** | 0.483*** |
| Industry: Personal and Social services | 0.353*** | 0.352*** | 0.487*** | 0.402*** | 0.399*** | 0.400*** |
| Industry: Private services | 0.469*** | 0.507*** | 0.620*** | 0.461*** | 0.468*** | 0.431*** |
| Industry: Other | 0.517*** | 0.074*** | 0.660*** | 0.394*** | 0.933*** | 0.142 |
| Self-employed | 0.052** | 0.076*** | 0.103*** | 0.094*** | 0.046** | 0.110*** |
| Public sector workers | -0.454*** | -0.516*** | -0.493*** | -0.470*** | -0.455*** | -0.433*** |
| Informal sector workers | 0.325*** | 0.370*** | 0.210*** | 0.327*** | 0.251*** | 0.333*** |
| Union member | 0.324*** | 0.225*** | 0.287*** | 0.257*** | 0.259*** | 0.176*** |
| Lambda | -0.077 | -0.071 | -0.146 | -0.145 | -0.103 | 0.090 |
| Constant | 0.681 | 0.789 | 0.925 | 0.954 | 0.815 | 0.863 |
| | | | | | | |
| R-squared | 0.5873 | 0.5665 | 0.5808 | 0.5975 | 0.593 | 0.615 |
| Adjusted R-squared | 0.5864 | 0.5656 | 0.5799 | 0.5967 | 0.5922 | 0.614 |
| Number of observations (weighted) | 11,894,320 | 12,287,798 | 12,437,963 | 12,787,285 | 12,634,896 | 13,293,327 |

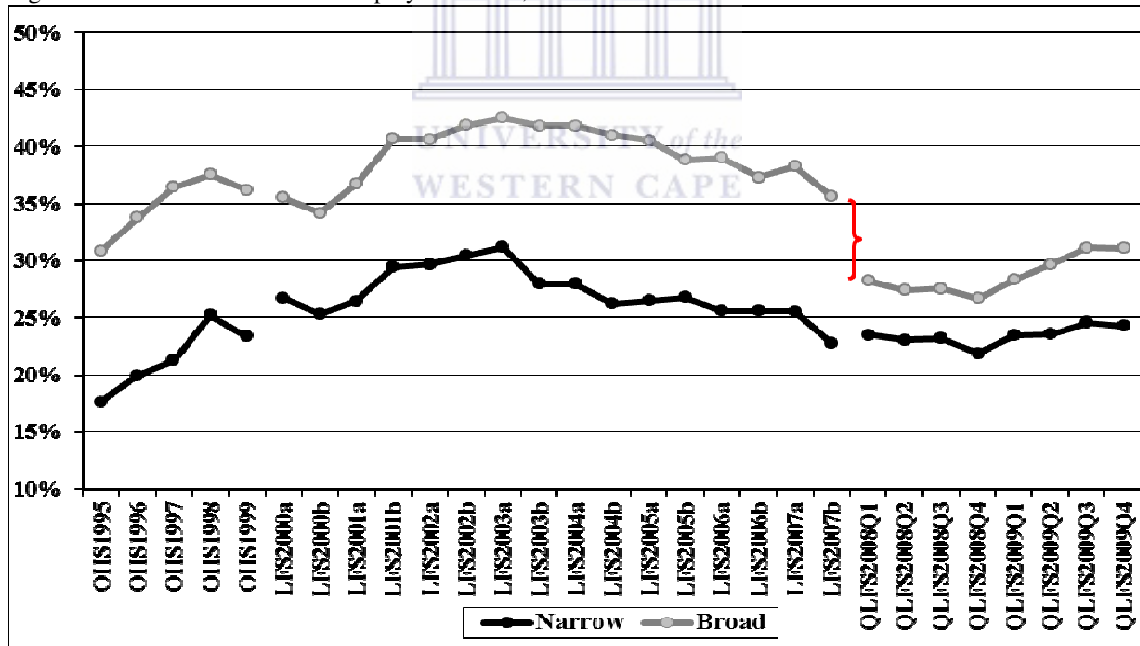\*\*\* Significant at 1%     \*\* Significant at 5%     \* Significant at 10%

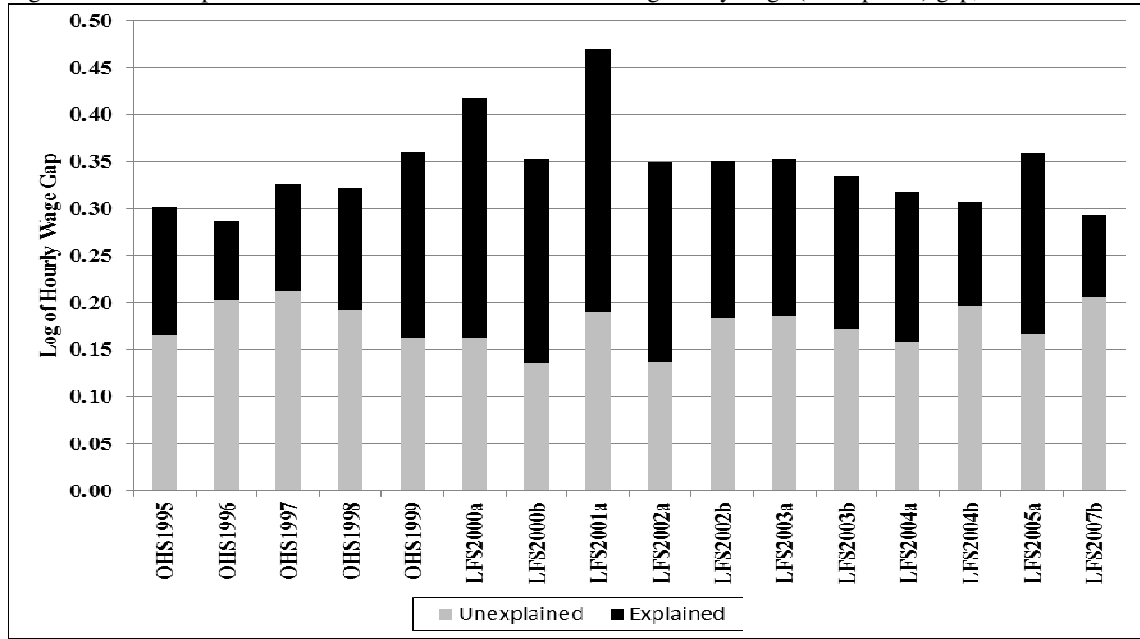Figure A.1: Narrow and broad labour force participation rates, 1995-2009
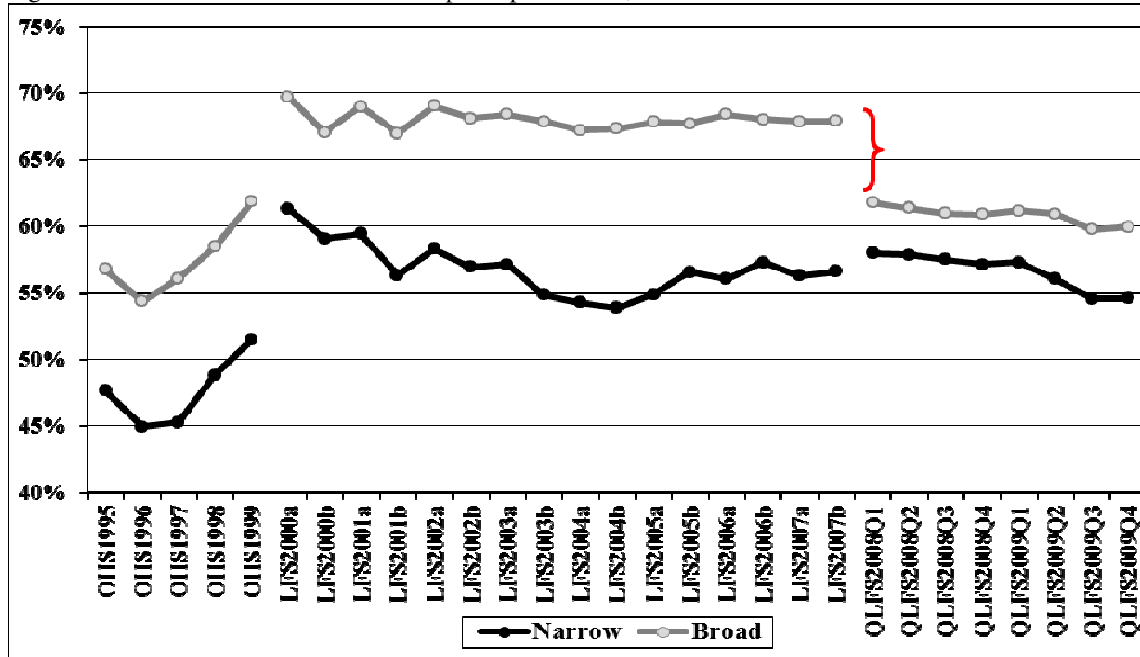


Source: Own calculations using OHS, LFS and QLFS data.

Figure A.2: Narrow and broad unemployment rates, 1995-2009



Source: Own calculations using OHS, LFS and QLFS data.

Figure A.3: Decomposition of the African male-female mean log hourly wage (2000 prices) gap, 1995-2007
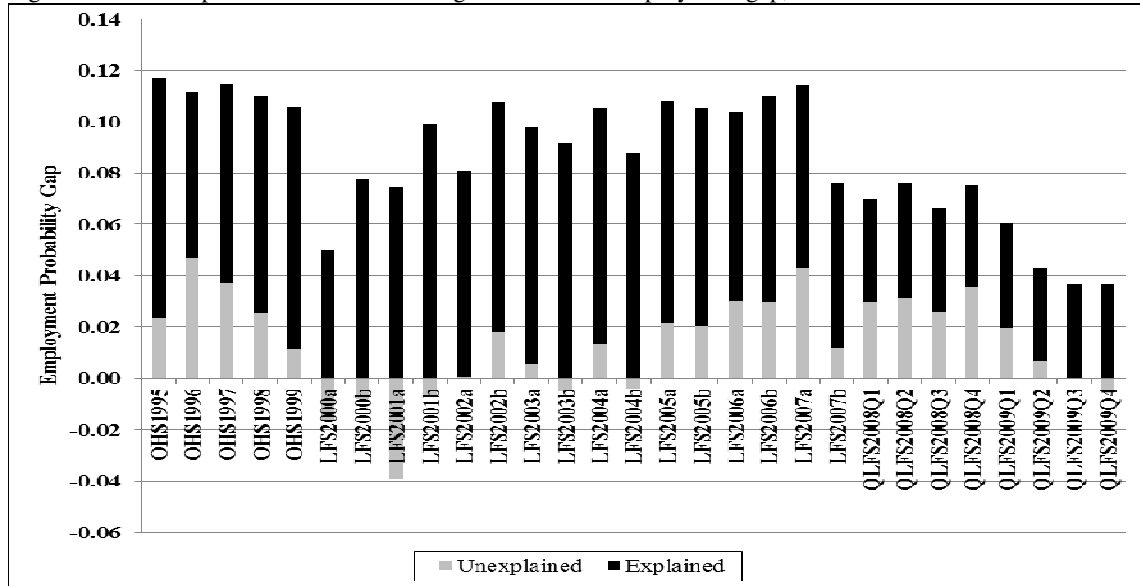


Source: Own calculations using OHS and LFS data.

Figure A.4: Decomposition of the African male-female log of hourly wage (2000 prices) gap, excluding self-employed, domestic workers and informal sector workers, 1997-2007
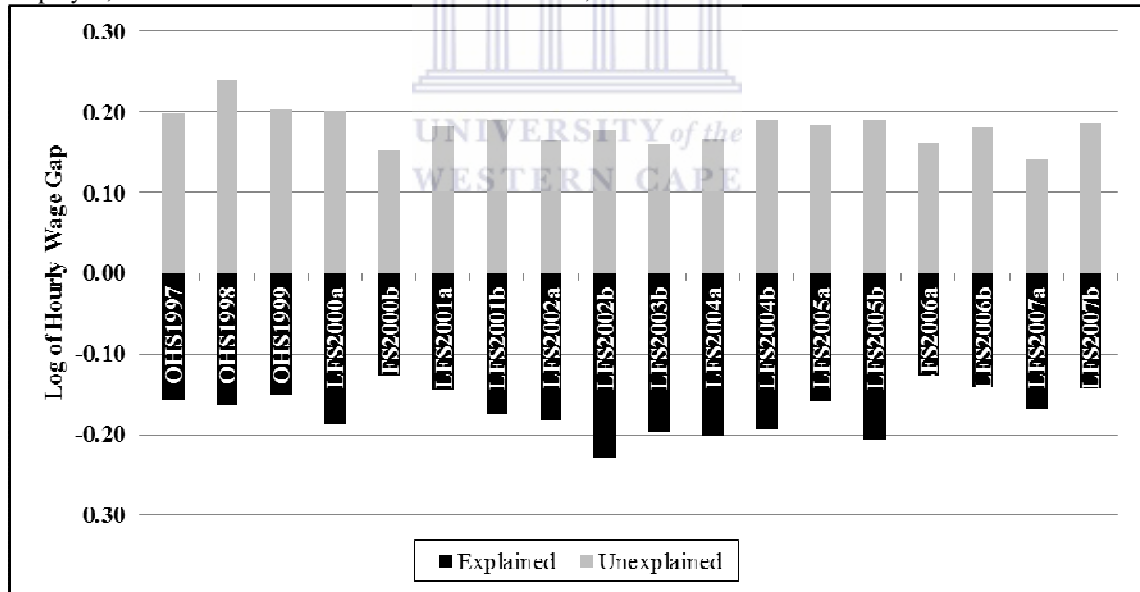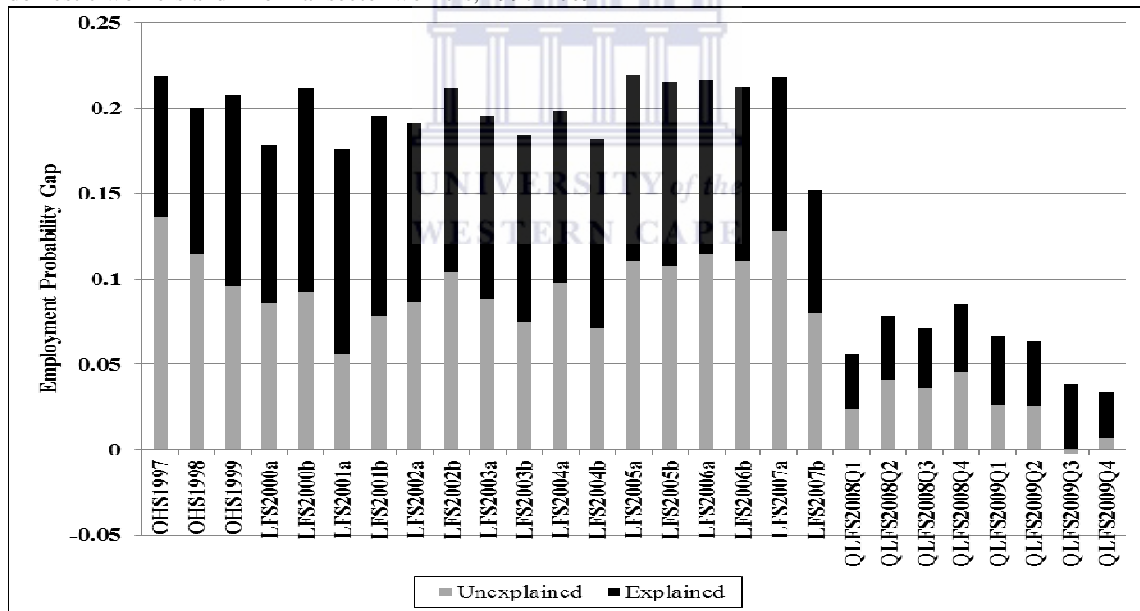


Source: Own calculations using OHS and LFS data.

Figure A.5: Decomposition of African average male-female employment gap, 1995-2009



Source: Own calculations using OHS, LFS and QLFS data.


Figure A.6: Decomposition of African average male-female employment gap, excluding self-employed, domestic workers and informal sector workers, 1997-2009



Source: Own calculations using OHS, LFS and QLFS data.