DISPARITIES IN ACCESS TO PAID LEAVE AND THEIR IMPLICATIONS FOR GENDER INEQUALITY: THE CASE OF SOUTH AFRICA

Jacqueline Mosomi¹, Muna Shifa¹, Amy, Raub², and Jody Heymann²

¹African Centre of Excellence for Inequality Research (ACEIR)

²WORLD Policy Analysis Center Corresponding author. E-mail address: muna.shifa@uct.ac.za.

Abstract

Access to paid leave, as part of social protection, is crucial for minimising health and economic disparities. In the absence of paid leave, women and low-income workers are more likely to forego necessary leave due to a lack of resources to fall back on. There is little research on inequalities in access to paid leave and its determinants in developing countries context. In this study, we examine inequalities in access to paid leave in South Africa and its implications for gender inequality. Our research reveals considerable inequalities in access to paid leave in South Africa based on employment contract type, UIF contributions, wage, and educational level. The findings underline the importance of better labour market and social safety net policy formulation and implementation. That is, because maternity/paternity leave is related to UIF, and there are significant discrepancies in who is eligible for UIF contributions. This is important considering that women and Black Africans are concentrated in industries that record the most violations in terms of access to paid leave and other labour regulations.

Keywords: Paid family leave, Industry sector, Gender, Inequality.

Introduction

Access to paid family and medical leave (PFML) is critical for enabling workers to meet their personal and family health needs while maintaining economic security (International Labour Organization 2021). Several studies have documented the benefits of access to paid leave¹ in the literature. For example, access to paid parental leave is associated with better infant health outcomes, lower infant mortality rates, and higher immunisation rates (e.g., Ahmed and Fielding 2019; Roy Choudhury and Polachek 2021; Heshmati, Honkaniemi, and Juárez 2023), as well as supports breastfeeding, which benefits both mothers and infants (Chai, Nandi, and Heymann 2018; Lebihan and Mao Takongmo 2023). Paid parental leave also benefits mothers' physical and mental health (Albagli and Rau 2019; Heshmati et al. 2023) as well as their work and earnings (Albagli and Rau 2019; Bartel et al. 2023; Mari and Cutuli 2021 Frodermann, Wrohlich, and Zucco 2023). Similarly, access to paid sick leave which enables preventive health care and timely access to medical treatment reduces emergency room visits (Asfaw and Colopy 2017; Ko and Glied 2021), reduces the spread of disease during pandemics like the COVID-19 (Fong and Iarocci 2020; Pichler, Wen, and Ziebarth 2020).

Although many nations have some sort of paid or unpaid leave policies, there are considerable inequalities in access to paid leave that are driven by labour market structures and pre-existing inequalities within a country, potentially exacerbating existing social inequalities. Existing research on disparities in access to paid leave and its determinants has primarily focused on developed nations (Goodman et al., 2020; Elser et al., 2022; Goodman et al.,2022). In this study, we look at disparities in access to paid leave in South Africa, one of the world's most unequal countries. Furthermore, South Africa, like the rest of the developed world, is experiencing a care crisis. With a high disease burden due to the high rates of HIV/AIDS and tuberculosis (Burger and Ngwenya 2021), an increasing number of the elderly, and a lack of universal childcare policies, paid leave policies are crucial to enable employees to stay attached to the labour force while also caring for the sick, the elderly, and children.

It is also important that leave policies do not exacerbate already existing inequalities. While increased female labour force participation is one of the salient characteristics of the post-apartheid South African labour market, women still have lower employment rates² compared to men and they are concentrated in low paying

¹ In many contexts, there are three main types of paid leave that matter for personal and family health: (1) paid leave for personal medical needs to cover both short-term health needs and medical appointments and longer term illness or recovery from serious accidents, (2) paid leave for family health needs to cover caring for family members or loved ones of all ages from childhood through old age, and (3) paid parental leave to support infant care and healthy development during a period of particularly intensive care needs.

² Female labour force participation rate increased from 40% in 1994 to about 54% in 2019 compared to male labour force participation rate which increased from about 60% in 1994 to 67% in 2019 (Casale et al. 2021). Despite this increase, the gender gap in the employment rate was about 12% in 2019 (Casale et al. 2021).

elementary occupations (Casale et al. 2021). Black³ women especially are concentrated in domestic work and the informal sector where working conditions are precarious, and enforcement of worker protection rights is low (Rogan and Alfers 2019). In addition, these groups of employees are also the most likely to be living in households with high dependency ratios. It is common to find black female headed households to be multigenerational with children and the elderly that need care (Posel and Hall 2021). If the working conditions such as the wages and the leave policies of these employees are not favorable, there is the danger of a vicious cycle of poverty. That is, children from these households will receive poor early childhood care resulting in unfavorable labour market outcomes in their adulthood and so on. Furthermore, South Africa remains a patriarchal society where majority of the care responsibilities fall on women (Casale et al. 2021; Hatch and Posel 2018). To encourage male contribution to care responsibilities and to promote gender equality, men and women must have equal access to paid leave.

Since 1994, the South African government has introduced several legislation and policies targeted at reducing workplace discrimination and inequality while also enhancing the well-being of the majority. Although these legislations provide for various types of leaves in South Africa, such as paid sick leave, paid annual leave, and unpaid parental and maternity leave, our analysis show that who benefits from such provisions is determined by a number of factors, including the nature and duration of employment and contribution to the unemployment insurance fund (UIF), and education and wage levels. We also show that there are large inequalities in accessing UIF depending on the nature of employment which has important implications for women health and labour market outcomes.

The Basic Conditions of Employment Act 75 of 1997 grants women four months of unpaid maternity leave after giving birth. If employee have worked at least 24 hours per month and both the employers and employees have contributed 1% of monthly earnings to the UIF, pregnant women are entitled to financial benefits during maternity leave (Pereira-Kotze et al., 2022). Such policy laws exclude people who work less than 24 hours per month and those for whom the worker and employer do not pay UIF. In addition, despite the legislation, many women have practical problems in accessing financial benefits during maternity leave (Pereira-Kotze et al., 2022; Matotoka, & Odeku, 2020). These challenges include lack of UIF contribution by large share of women, delay in the processing for those applied, and lack of enforcement of current legislation (Pereira-Kotze et al., 2022). This evidence indicates that beyond direct barriers to accessing paid leave, poor implementation may also hinder workers' ability to take paid leave for their personal and family health needs.

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³ The far-reaching effects of the apartheid regime in South Africa mean that no discussions on inequality can be had without referring to race. Hence, the official statistical agency, Statistics South Africa and other government agencies group the South African population into four groups: Black Africans, Coloured, Asian/Indian, and White. We use these race categories in this paper.

Determinants of inequalities in access to paid leave

Access to paid leave, as a part of social protection, is critical for reducing inequalities in health and economic security. In the absence of paid leave, low-income workers are the most likely to forgo needed leave due to a lack of resources to fall back on (Rossin 2011). Numerous studies have affirmed that the benefits of access to paid leave are greatest among workers who would otherwise face the greatest disadvantage, whether due to family income, education level, family status, or other factors (Albagli and Rau 2019; Broadway et al. 2020; Carneiro, Løken, and Salvanes 2015; Honkaniemi et al. 2022; Misra et al. 2012; Pac et al. 2023). Moreover, due to the role that the social determinants play in determining overall health (Coker, Thomas, and Chung 2013), these workers and their families are also likely to have the greatest health needs and are most in need of having economic barriers to taking paid leave lowered.

There are significant disparities in access to paid leave that are influenced by the structure of the labour market and pre-existing inequalities within a country, potentially further worsening existing social inequities. Policy design features can also undermine the health, economic, and equity benefits of paid leave. Previous studies have documented how seemingly neutral policy decisions, such as eligibility requirements that require a minimum period of employment or firm size, can exacerbate inequalities across race, education level, gender, and income (Chorny et al. 2021; Heymann et al. 2021; Sprague et al. 2023). In some countries, paid leave policies may fail to cover entire classes of workers, such as the self-employed, agricultural workers, or domestic workers (Heymann, Sprague, and Raub 2023; Son and Böger 2021. Given the intersection between type of work and other markers of disadvantage, this lack of coverage may further exacerbate inequalities. Disparities may also be increased when workers cannot afford to take paid leave due to low payment rates or lack of job protection (Bose et al. 2020).

In the South African context, the health, economic, and equity enhancing features of paid leave are particularly important. South Africa is one of the most unequal countries in the world with persistently high level of income and wage disparity, with labour income being the main source of income for most South African families (See Shifa et al.2023). Thus, disparities in the labour market outcome then translate to disparities in various aspects of well-being. Inequalities in access to paid leave have a considerable negative impact on poverty and inequality, given that unemployment rates are higher for disadvantaged groups such as women, and they are more likely to be concentrated in lower-paid jobs. Women and Black Africans face greater unemployment rates and are more likely to work in low-paying jobs (see Gradín 2019). Thus, lack of or inadequate paid leave such as maternity leave can continue to exacerbate existing inequalities in maternal and child health outcomes (see Martin-Wiesner, 2018).

Previous research documented that South African women working on farms and in the informal sector were historically disadvantaged because they were not entitled to maternity leave, leaving them with no choice but to work up to one to two weeks before the child's birth and return to work immediately afterward (Kehler (2001: p48). Since 1994, the South African government has introduced several legislation and policies targeted at reducing workplace discrimination and inequality while also enhancing the well-being of the majority. These included, among other things, the Labour Relations Act 66 of 1995, the Employment Equity Act 55 of 1998, and the Basic Conditions of Employment Act 75 of 1997 (see Pereira-Kotze et al., 2022).

Although these legislations provide for various types of leaves in South Africa, such as paid sick leave, paid annual leave, and unpaid parental and maternity leave, who benefits from such provisions is determined by a number of factors, including the nature and duration of employment and contribution to the unemployment insurance fund (UIF)(see Jaga and Farista, 2023 for a recent review).

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The above observation indicates that beyond direct barriers to accessing paid leave, poor implementation may also hinder workers' ability to take paid leave for their personal and family health needs. Previous studies elsewhere also have identified gaps in awareness of paid leave policies, particularly for low-income workers (Goodman, Elser, and Dow 2020; Nguyen et al. 2022; Schuster et al. 2009). Workplace culture is also important for leave taking. Workers may be hesitant to take paid leave for fear of retaliation. Similarly, there may be other barriers to applying for and accessing payments while on leave.

Methodology

Data sources

We use data from the South African Quarterly Labour Force Survey (QLFS), which is a nationally representative household-based sample survey conducted by Statistics South Africa (Stats SA). The survey collects data on the labour market activities of individuals aged 15 years or older (Stats SA, 2019). The survey design follows a stratified two-stage approach, utilizing probability proportional to size (PPS) sampling for Primary Sampling Units (PSUs) and systematic sampling for dwelling units (DUs). The QLFS sample comprises approximately 30,000 DUs based on 3,080 PSUs distributed into four rotation groups whereby in each quarter, 25% of the sampled dwellings are rotated out of the sample and replaced by new dwellings from the same PSU or the next PSU on the list.

⁴ Maternity leave benefit through UIF has be changing over time increasing from 45% during 1995/1996 to 66% since 2020(Jaga and Farista, 2023).

⁵ Pereira-Kotze et al. (2022: p.695) documented that according a Statistics South Africa report, Only 58.6% of eligible women have contributed to the UIF, hence 41.4% cannot collect financial benefits during maternity leave.

The QLFS is well suited for this analysis as it collects information on labour force participation and employment including sectors of employment and working conditions such as contract types, entitlement to family or medical leave, and contribution (both employers and employees) to the unemployment insurance fund (UIF). Access to the different types of leaves are all self-reported responses to the question of whether the employed individual was entitled to any paid vacation leave, paid sick leave, and maternity or paternity leave. From the survey questionnaire, there is no information on whether maternity or paternity leave is paid or not. However, in South Africa, while statutory maternity/paternity leave is unpaid, income replacement benefits are collected through employer/employee contribution to UIF. For most employees therefore especially those in formal employment and have permanent contracts, the assumption is that they would have access to maternity/paternity leave benefits even though maternity/paternity leave is unpaid. Information about UIF is also self-reported where individuals were asked whether their employers pay UIF contributions for them.

Ideally, we wanted to base our empirical analysis on the 2019 QLFS as the last survey preceding the COVID-19 pandemic therefore not contaminated by the effects of the pandemic. However, QLFS 2019 has no wage data because since 2010 Statistics South Africa has not been releasing the wage information with the QLFS data. Instead, Stats SA releases the wage data in an annualised form of the QLFS called the Labour Market Dynamics study (LMDS). Since wage information is an integral part of working conditions and a main driver of overall inequality in South Africa, we use 2017 wage information from the Post-Apartheid Labour Market Series (PALMS) dataset (Kerr et al. 2019). PALMS is a harmonized dataset curated by DataFirst at the University of Cape Town and is constructed from several South African Labour Force Surveys including the QLFS for the years 1993-2019. While the wage information in PALMS is also from LMDS, DataFirst has put in a lot of work to harmonize the data for each QLFS quarter and provides bracketweights to account for earnings given in brackets and provides a variable that identifies outliers in the data. As mentioned above, PALMS contains data up to QLFS 2019 however, the last wage information in the data is for QLFS 2017 which is the data we use for all the regressions and descriptive analysis involving the wage variable. For other descriptive figures and tables not involving wages, we utilise data from QLFS 2019. We do this to show the labour market dynamics as of 2019 which do not differ in a significant way from the labour market dynamics in 2017. We expect that our regression results using 2017 data would still hold two years later in 2019.

Regression analysis

We estimate the determinants of access to the three types of leaves: paid vacation leave, paid sick leave, or maternity or paternity leave. For this purpose, we specify the following linear probability regression model (LPM):

$$Y_i = \beta_0 + X_i'\beta_i + Z_i'\gamma_i + \varepsilon_i$$

Where Y_i is the self-reported access to either paid vacation leave, sick leave or maternity/paternity leave for individual i, X_i' is a vector of individual demographic and social factors, Z_i' indicates wage and employment condition factors of individual i, and ε_i is the error term. The demographic factors include age, race, gender, marital status, and education. The employment condition variables include contract duration (1=permanent 0=otherwise), contract type (1=written contract, 0=verbal contract), sector of employment

(1=Formal sector, 2=Informal sector, 3=private households), union membership (1=union, 0=otherwise), and UIF contribution which is a self-reported variable for whether the employer contributes to UIF or not (1=employer contributes to UIF, 0=otherwise). We also include a control for geographical location defined as a binary variable (1=urban, 0=rural).

Given our dependent variables are binary variables, we also estimate a logistic regression model (LOGIT). However, the results from the LPM and the LOGIT regression models are very similar. We therefore only report results from the LPM regression model in this paper⁶. The regression analysis sample includes wage employed individuals aged between 15 and 65 years in the formal or informal sector.

Results and discussions

In this section, we present results from our data analysis. We start by presenting descriptive analysis of the nature of employment and access to the different types of leaves in South Africa. Later, we discuss the findings from our regression analysis.

Descriptive section: the nature of employment and access to the different types of leave

Unlike many other Sub-Sahara Africa (SSA) countries where informal self-employment is the prevalent form of employment, wage employment is the most common form of employment in South Africa. Over 80% of employed individuals were working in wage employment in 2019 (Table A1 in the appendix). There are large disparities in employment outcomes by education level with more educated individuals being more likely to be employed. Similarly, there are also disparities in employment rates based on income levels⁷, with individuals from higher-income households being more likely to be employed. The proportion of employed individuals is consistently greater for males than females across all racial groupings and educational levels. While both men and women are more likely to be in wage employment given the very small self-employment sector in South Africa, men are more likely to be in self-employment compared to women an indication that the barriers to entry into self-employment are greater for women. As Table A1 in the appendix shows, there is a higher share of men in self-employment compared to females.

Looking at the nature of employment, only 62% of those in wage employment report having a permanent contract, and a higher number (80%) report having a written contract (Table 1). Disaggregating the sample into various demographic characteristics reveals large disparities in the duration and kind of contract by gender, race, and educational attainment. A higher share of males compared to females report having a permanent contract regardless of race or education level. For instance, the percentage of male wage workers with permanent contracts ranges from 57% among Black Africans to 89% among Whites while that of females ranges from 53% for Black Africans to 87% for Whites. Looking at education attainment, individuals with lower than grade 12 (incomplete high school) are less likely to report having a permanent contract or a written contract. Only 40% of Black African women with less than grade 12 education have permanent contracts

⁶ Logit regression results are available from the authors upon request.

⁷ We use income data from the 2017 national income dynamics survey (NIDS) to estimate employment status of individuals aged 15-65 by per capita income levels.

compared to 87% of those with graduate degrees. In addition, as shown in Figure A1 in the appendix, there is a high correlation between having a written contract and being on a permanent employment contract. Individuals with informal verbal agreements are also more likely to be non-permanently employed (Figure A1 in the appendix) making their working conditions precarious. Figure A1 also shows large inequalities across wage deciles with the likelihood of having a permanent contract increasing with wage regardless of whether one has a written contract or a verbal contract. Among those with written contracts, the proportion of those with permanent contracts ranges between 50% to slightly over 58% in the bottom three wage deciles to between 85% and 90% in the top three deciles. Interestingly however, the disparities across wage deciles are less pronounced for individuals with verbal contracts. That is, over 80% of individuals who report having a verbal contract also report having a non-permanent contract across the wage deciles. Indicating that having a verbal contract is synonymous with casual/non-permanent employment.

Table 1: Disparities in the nature of wage employment by gender, race and education

	Peri	manent	Non-p	ermanent	W	ritten	Ve	rbal
Total	0.62		0.38		0.80		0.20	
	Male	Female	Male	Female	Male	Female	Male	Female
Gender	0.63	0.60	0.37	0.40	0.81	0.80	0.19	0.20
	P	opulation ;	group					
African/Black	0.57	0.53	0.43	0.47	0.77	0.75	0.23	0.25
Coloured	0.70	0.69	0.30	0.31	0.85	0.86	0.15	0.14
Indian/Asian	0.78	0.82	0.22	0.18	0.89	0.95	0.11	0.05
White	0.89	0.87	0.11	0.13	0.96	0.95	0.04	0.05
		Educatio	on					
Less than grade 12	0.50	0.40	0.50	0.60	0.68	0.63	0.32	0.37
Grade 12 (Matric)	0.69	0.66	0.31	0.34	0.89	0.88	0.11	0.12
Other tertiary	0.78	0.72	0.22	0.28	0.94	0.93	0.06	0.07
Graduates	0.89	0.87	0.11	0.13	0.98	0.98	0.02	0.02

Source: Authors' estimates using data from the QLFS 2019(Quarter 1). Notes: Sample contains wage employed individuals aged 15-65. Population weights applied.

UIF contributions and access to paid leave

Table 2 presents a description of the share of wage employed individuals who report UIF contributions by their employers and the share of those who report having access to paid leave depending on whether they have permanent or non-permanent contracts. There are glaring disparities in both UIF contributions and access to paid vacation between those in permanent and non-permanent contracts but even within these groups, large gaps exist by gender, race, and highest education qualification. Close to 90% of those with permanent contracts reported having access to paid vacation leave compared to only 30% for those with non-permanent contracts. Similarly, while 79% of those with permanent contracts reported having UIF contributions, the figure is only 37% for those with non-permanent contracts. For those who report having a permanent contract, the gender gap in UIF contribution of 9% compared to a 5% gender gap among non-permanent employees. A deeper look into disparities by race shows that regardless of contract type, Black-African women report the lowest figures of UIF contribution with only 69% of permanently employed Black-African women report the lowest figures of UIF contribution with only 69% of permanently employed Black-

African women reporting UIF contribution compared to 86% for Coloured and White women. Interestingly, while gender gaps in UIF contribution remain across all education groups, individuals with university degrees report the lowest figure for UIF contribution among permanently employed workers. The gender gap is also widest in this group at about 11%. A possible explanation for this would be that majority of workers in this group would be public sector professionals and managers who have access to comprehensive private insurance paid for by employers and employers/employees are not required to make UIF contributions. Looking at wage deciles, we find that large disparities in UIF contribution between permanent and non-permanent contract employees exist across all wage deciles (Figure A2 in the appendix).

Table 2: Paid leave and UIF deduction by contract duration and gender, race, and education

		Permanent				Non-permanent			
	U	UIF		Paid vacation		UIF		Paid vacation	
	contr	contribution		leave		contribution		leave	
Overall	0	0.79		0.90		0.37		0.30	
	Male	Female	Male	Female	Male	Female	Male	Female	
Gender	0.83	0.74	0.91	0.90	0.39	0.34	0.31	0.29	
		Pop	oulation	group					
African/Black	0.80	0.69	0.89	0.88	0.37	0.31	0.29	0.28	
Coloured	0.90	0.86	0.97	0.95	0.55	0.55	0.42	0.36	
Indian/Asian	0.80	0.83	0.90	0.92	0.33	0.57	0.36	0.47	
White	0.89	0.86	0.95	0.94	0.66	0.42	0.47	0.37	
Education									
Less than grade 12	0.89	0.83	0.87	0.81	0.32	0.27	0.24	0.21	
Grade 12 (Matric)	0.86	0.84	0.91	0.90	0.52	0.45	0.40	0.36	
Other tertiary	0.82	<mark>0.74</mark>	0.94	0.93	0.52	0.40	0.47	0.45	
Graduates	<mark>0.68</mark>	<mark>0.57</mark>	0.96	0.96	0.62	0.49	0.63	0.58	

Source: Authors' estimates using data from the QLFS 2019(Quarter 1). Notes: Sample contains wage employed individuals aged 15-65. Population weights applied.

This paper is interested in the factors that affect access to different types of leave. In South Africa, the Unemployment Insurance Fund (UIF) provides income replacement benefits not only in instances of unemployment, but also in case of illness, maternity, adoption. In addition, UIF pays dependent benefits in case of a death of a contributing employee. This means that in a country where there is a high disease burden and statutory maternity leave is unpaid, contribution to UIF allows employees especially those that do not have access to comprehensive private insurance to take longer sick leave or family responsibility leave if need arises. Table 3 provides a description of the share of wage employees who have access to either paid vacation leave, paid sick leave or maternity/paternity leave depending on whether they contribute to UIF or not.

Overall, the table shows that compared to those without UIF, there is a disproportionately higher share of employees with UIF contributions who report having access to leave be it paid vacation leave, paid sick leave or maternity/paternity leave. That is, while only 68% of wage employed individuals report having access to paid leave, approximately 85% of wage employees with UIF contributions report having access to paid vacation leave compared to only 38% of those with no UIF contributions. The pattern is the same for those with access to paid sick leave and maternity/paternity leave even though the share of UIF contributors who report having access to paid sick leave is 91% compared to only 75% for those who have access to maternity/paternity leave. In addition, we find disparities in access to the three types of leave by race and

education level, particularly among those who reported no UIF contribution. For instance, among those with no UIF contributions, access to paid leave was reported by 16% of those with less than a grade 12 education, while the percentage ranges between 60 and 89% for those with tertiary education. We find similar disparities in access to paid leave across wage deciles particularly, for those with no UIF contributions (Figure A3 in the appendix). Among those with no UIF contributions, the percentage of wage workers with access to paid leave increases from less than 20% for those in the bottom three wage deciles to 70% or more for those in the top three wage deciles.

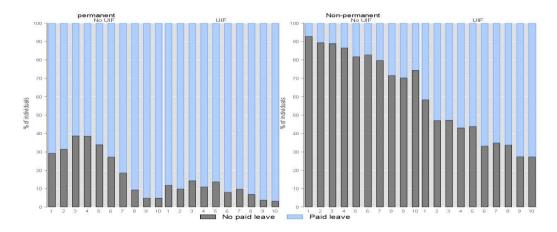
Table 3: Access to leave by UIF contribution and demographics (QLFS 2019)

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	Paid vacation	leave	Sick leav	ve .	Mat/paternity leave			
Nationally	0.68		0.72		0.59			
	No UIF	UIF	No UIF	UIF	No UIF	UIF		
Total	0.38	0.85	0.40	0.91	0.32	0.75		
		Gende	er					
Male	0.36	0.86	0.38	0.92	0.30	0.72		
Female	0.40	0.83	0.41	0.90	0.34	0.78		
	Population group							
African/Black	0.36	0.82	0.38	0.89	0.30	0.70		
Coloured	0.41	0.90	0.40	0.92	0.35	0.79		
Indian/Asian	0.52	0.90	0.58	0.96	0.38	0.83		
White	0.62	0.94	0.65	0.97	0.59	0.89		
		Educati	on					
Less than grade 12	0.16	0.79	0.16	0.86	0.09	0.64		
Grade 12 (Matric)	0.41	0.85	0.46	0.92	0.33	0.77		
Other tertiary	0.60	0.91	0.63	0.96	0.51	0.85		
Graduates	0.88	0.94	0.90	0.97	0.87	0.91		

Source: Authors' estimates using data from the QLFS 2019(Quarter 1). Notes: Sample contains wage employed individuals aged 15-65. Population weights applied.

Figure 1 shows large disparities in access to paid vacation leave among those within the same wage deciles based on whether they have a permanent or a non-permanent contract. For instance, among those with no UIF contributions but with permanent contracts, about 62-70% of those in the bottom five wage deciles reported having access to paid vacation leave, compared to only 20% for those with non-permanent contracts. We also find disparities in access to paid vacation leave within the same wage deciles among those with UIF contributions based on contract type. Among those with UIF contributions and with permanent contracts, access to paid vacation leave ranges between 42% to 58% for those in the bottom five wage deciles while the corresponding figure for those with non-permanent contracts ranges between 85-90% (Figure 1).

Figure 1: Paid leave by UIF deductions and type of contract across wage quantiles



Source: Authors' estimates using data from the QLFS 2017(Quarter 1). Notes: Sample contains wage employed individuals aged 15-65. Population weights applied.

The descriptive analysis in this section reveals that disparities in terms of who gets access to any of the three types of leaves considered in this study are compounded. That is, the nature and duration of employment will determine who gets access to paid vacation leave and will also influence who gets access to UIF and in turn this influences who has access to income replacement benefits in the case of maternity/paternity leave or prolonged illness. Workers with a permanent contract are more likely to report having access to paid vacation leave and to having UIF contributions. Less educated Black women are most likely to have non-permanent contracts. This means that they are also the least likely to be in jobs that afford them paid leave be it vacation leave, sick leave or maternity/paternity leave. Descriptive results showed that having UIF contributions matters most for those with less that complete high school education and for Black African and coloured subpopulations groups. For those with university degrees, there is still a large percentage that has access to leave whether they have UIF or not. This could be because, even with a permanent contract, access to paid vacation leave is routinely negotiated between employers and employees. For instance, while employers are not legally compelled to pay employees for maternity leave, it is common practice for employers to provide some form of maternity benefits (Kasselman, 2019). In such cases, individuals with greater levels of education or wage may be in a better position to receive paid leave than others. For those at the bottom of the wage distribution however, because they have non-permanent contracts, their employers are also less likely to be contributing towards UIF and while they need the income replacement benefits the most, they are least likely to access them. In addition, because only those employed can access UIF, the unemployed who are majority poor and Black, are excluded from the social protection provided by UIF.

In the next section we present regression results of the linear probability model which formally estimates the relationship between the three types of leaves and the working conditions and demographic characteristics discussed above.

Regression Results

We present estimation results based on the LPM in Table 4 to investigate the characteristics associated with access to paid vacation leave, paid sick leave, and maternity/paternity leave. We estimated two models for each dependent variable. In the first model, we only control for demographic, educational, and geographical location indicators, whereas in the second model, we control for employment conditions such as sector of employment, duration and type of contract, UIF contribution, union status, and wage quintiles.

Column 1 of each model in Table 4 shows that regardless of the type of leave, women, Black Africans, and young people aged 15-24 are less likely to have access to leave. However, once we control for wage and employment conditions there is a positive gender gap in accessing maternity/paternity leave as expected because mostly women take up this leave. Only in recent years that access to paternity leaves are being introduced in South Africa. With regards paid vacation leave and paid sick leave, the coefficients on gender, race and age become insignificant except for the coefficient for the Indian population group, which remains significant across all models. The results on maternity leave are interesting given that even after working conditions are controlled for, gender, race, marital status, and geographical location remain important. The results on race could be attributed to the fact that Black Africans are concentrated in sectors and occupations where violations of worker protection laws such as leave entitlement and minimum wage are high. For instance, according to Bhorat et al (2021), 87% of domestic workers and 74% of Agricultural workers report lacking access to maternity/paternity leave. They also report that violation of leave policies is highly correlated to minimum wage regulations meaning that these are also some of the worst paid workers. Hence the fact that demographic characteristics are significant even after controlling for working conditions is an indication that there are other important variables affecting access to paid leave that we have not controlled for due to data challenges including type of firm and policy implementation (Bhorat et al. 2021).

The coefficient estimates on marital status indicator remain positive and significant in the paid vacation and maternity/paternity regressions while age is a significant factor only in the paid vacation and paid sick leave regression models. The results suggest that married individuals are more likely to report having access to paid vacation leave and maternity/paternity leave. With regards to marital status, there is literature on declining marriage rates especially among the Black African subpopulation due to economic reasons (Casale and Posel 2010). This may suggest that married individuals are on average better off economically and therefore might be in jobs that afford them good working conditions while unmarried individuals might be in precarious employment.

Table 4: Determinants of access to paid leave

	Paid vacat	Paid vacation leave		Paid sick leave		Maternity/Paternity leave	
	(1)	(2)	(1)	(2)	(1)	(2)	
Female	-0.066***	-0.009	-0.059***	-0.001	-0.015*	0.050***	
	(0.009)	(0.007)	(0.008)	(0.006)	(0.009)	(0.007)	
Race: omitted= Black A	Africans						
Coloured	0.090***	0.016	0.063***	-0.015	0.082***	0.025**	
	(0.016)	(0.011)	(0.016)	(0.011)	(0.017)	(0.013)	
Indian	0.093***	0.061***	0.083***	0.049**	0.073***	0.057***	
	(0.022)	(0.023)	(0.019)	(0.020)	(0.024)	(0.021)	
White	0.081***	0.010	0.078***	0.005	0.079***	0.030**	
	(0.014)	(0.013)	(0.012)	(0.010)	(0.016)	(0.014)	
Married	0.080***	0.019***	0.055***	-0.003	0.083***	0.020***	
	(0.009)	(0.007)	(0.009)	(0.006)	(0.009)	(0.007)	
Urban	0.039***	-0.002	0.052***	0.012	0.052***	0.018**	
	(0.010)	(0.008)	(0.010)	(0.007)	(0.010)	(0.008)	
Age category: omitted=	:15-24						
25-34	0.109***	0.004	0.111***	0.012	0.099***	0.001	
	(0.018)	(0.014)	(0.018)	(0.013)	(0.018)	(0.015)	
35-44	0.132***	0.002	0.135***	0.015	0.140***	0.013	
	(0.019)	(0.014)	(0.018)	(0.013)	(0.018)	(0.015)	
45-54	0.158***	0.013	0.161***	0.032**	0.168***	0.020	
	(0.019)	(0.015)	(0.019)	(0.014)	(0.019)	(0.016)	
55-65	0.203***	0.042**	0.195***	0.051***	0.196***	0.029	
	(0.022)	(0.017)	(0.021)	(0.016)	(0.022)	(0.018)	
Education category: om	itted=Below grade 1	12					
Grade 12	0.232***	0.039***	0.258***	0.061***	0.274***	0.079***	
	(0.011)	(0.009)	(0.010)	(0.008)	(0.011)	(0.010)	
Other tertiary	0.310***	0.084***	0.325***	0.097***	0.388***	0.152***	
·	(0.017)	(0.014)	(0.015)	(0.012)	(0.018)	(0.016)	
Graduates	0.382***	0.108***	0.388***	0.119***	0.481***	0.180***	
	(0.011)	(0.012)	(0.010)	(0.010)	(0.011)	(0.012)	
Union	, ,	0.147***	, ,	0.128***		0.196***	
		(0.008)		(0.006)		(0.009)	
UIF		0.206***		0.208***		0.137***	
		(0.009)		(0.009)		(0.009)	

Table 4: Determinants of access to paid leave (continued)

					Maternity	//Paternity
	Paid vaca	Paid vacation leave		ck leave	leave	
	(1)	(2)	(1)	(2)	(1)	(2)
Sector: omitted =Formal						
Informal		-0.076***		-0.079***		-0.082***
		(0.014)		(0.014)		(0.013)
Private households		-0.005		-0.030**		-0.058***
		(0.014)		(0.015)		(0.014)
Permanent contract		0.298***		0.244***		0.296***
		(0.011)		(0.011)		(0.012)
Written contract		0.185***		0.253***		0.128***
		(0.014)		(0.014)		(0.013)
Earnings: Base=Quintile 1						
Quintile 2		0.052***		0.054***		0.024**
		(0.011)		(0.011)		(0.011)
Quintile 3		0.070***		0.085***		0.065***
		(0.012)		(0.011)		(0.012)
Quintile 4		0.080***		0.095***		0.093***
		(0.012)		(0.011)		(0.012)
Quintile 5		0.112***		0.109***		0.126***
		(0.012)		(0.010)		(0.013)
Constant	0.319***	0.057***	0.352***	0.059***	0.161***	-0.029*
	(0.019)	(0.017)	(0.018)	(0.016)	(0.018)	(0.017)
Observations	12,288	12,288	12,326	12,326	12,326	12,326
R-squared	0.148	0.510	0.160	0.551	0.192	0.488

Source: Authors' estimates using data from the QLFS 2017(Quarter 1). Notes: Sample contains wage employed individuals aged 15-65. Bracket weights applied for earnings given in brackets. Robust standard errors in parentheses *** p<0.01, ** p<0.05, * p<0.1.

The coefficient estimate for the education variable is significant in all our models, indicating that those with higher education are more likely to report having access to all the leave types than those with less education. Education outcomes in South Africa are unequal and the returns to education in South Africa are some of the highest in the World (Branson and Lam 2021). The implication here is that inequalities in South Africa are compounded. Black Africans are concentrated in the group with below matric level of education, in turn, this group is concentrated in elementary occupations where violations of laws in terms of paid leave are high, and the pay is low so they cannot even afford to take unpaid leave.

Looking at employment sectors and contract types, the coefficients for permanent and written contracts are positive and significant, whereas the coefficients for informal employment are negative and significant. These findings imply that those in informal employment are less likely to report access to paid leave, while those with formal, permanent and written contracts are more likely to report access to paid leaves, even after controlling for all other variables. Compared to working in the formal sector, working in private homes is

negative and significant in the paid sick leave and maternity/paternity leave regressions while the coefficient although negative it is not significant in the paid vacation regression. This those working in private homes may have access to vacation paid leave at the end of each year that may corresponds with their employers' annual vacation time; however, they are less likely to get paid maternity/paternity leave or paid sick leave. These results are consistent with previous research which finds that because the structure of the UIF is to cover formally employed individuals, informal workers are unable to benefit from maternity benefits (Hicks 2019) and workers in the domestic work sector and farms are also excluded because of the nature of the work (Rogan and Skinner 2021). Domestic work takes place in private homes, so enforcement of the law is also difficult.

The coefficient estimates for wage and UIF contributions are positive and significant, implying that people who reported having UIF contributions or earning a higher wage are more likely to be entitled to paid leaves. Similarly, union membership is a key determinant, with union members being more likely to report access to paid leaves in comparison with non-union members. These results are as expected because employees in unions have stronger bargaining power and therefore implementation of employee protection laws is higher for these workers (Bhorat et al. 2021).

Conclusions

The key benefit of paid leave is to improve the health and economic security of workers. However, when access to paid leave is unequally distributed, this can lead to unequal outcomes in health and economic security among workers. In this paper, we examined who gets access to paid family and medical leaves among workers in South Africa a country which is characterized by high level of inequality in labor market outcomes and social inequalities.

Our analysis finds significant disparities in access to paid leave in South Africa based on employment contract type, UIF contributions, wage, and education level. In South Africa, access to paid leave, notably maternity/paternity leave, is closely linked to UIF contributions. However, there are significant inequalities in who is eligible for UIF contributions, with employees on permanent contracts being more likely to have UIF contributions made by their employers. We also show that access to paid leave varies significantly, even among people who do not have UIF contributions. Individuals with greater education levels, higher wages, and permanent or written contracts are more likely to be eligible for paid leave. These findings show that policies that improve the design and substance of employment contracts can be effective strategies for improving disadvantaged workers' rights to paid leave and increasing the enforcement of existing regulations.

Our findings also indicate that race is a key factor in determining access to maternity/paternity leave in South Africa, with Black Africans being less likely to declare entitlement to such leave. However, the focus of this article is only on whether individuals are entitled to maternity/paternity leave, not whether they are entitled to paid maternity/paternity leave. Because of data limitations, we do not know whether individuals who reported being entitled to maternity/paternity leave are also eligible for financial benefits. As a result, we are

likely underestimating the various barriers poor women face in receiving paid maternity leave and practical challenges of accessing UIF contributions documented by others (Hicks 2019; Pereira-Kotze et al.,2022).

The findings highlight the need for better labour market and social safety net policy formulation and enforcement. That is, because maternity/paternity leave is linked to UIF, and there are large disparities in who is eligible for UIF contributions, inequalities in social well-being can be further exacerbated. This is important given that Black Africans are concentrated in the sectors that record the most violations in terms of access to leave, such as agriculture, taxi, domestic work, and wholesale retail sectors (Bhorat et al. 2021; Bhorat, Kanbur, and Mayet 2012). These are also some of the lowest-paying sectors. As a result, while maternity/paternity leave is unpaid and dependent on UIF contributions, the workers who require the benefits the most are also the least likely to receive them. The COVID-19 epidemic demonstrated how, because the Temporary Employer-Employee Relief Scheme (COVID-19 TERS) was conducted through the UIF, women with higher unemployment rates than men, as well as those in the informal sector, were more likely to be excluded from social assistance during the crisis. While our sample focused on wage employment and demonstrated how education, wages, and other working circumstances influence access to leave, a broader discussion of social protection must include the majority of the labour force that is excluded. These are women with lower employment rates than men, Black Africans, individuals in the invisible economy, and young people.

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Appendix A

Table A1: Disparities in employment by gender, race and education (2019)

		Employed	Wage employed		Self e	mployed			
Total		0.43		0.85		0.15			
	Male	Female	Male	Female	Male	Female			
Gender	0.49	0.37	0.82	0.88	0.18	0.12			
Population group									
African/Black	0.45	0.35	0.83	0.88	0.17	0.12			
Coloured	0.55	0.43	0.92	0.96	0.08	0.04			
Indian/Asian	0.68	0.36	0.73	0.89	0.27	0.11			
White	0.73	0.55	0.75	0.84	0.25	0.16			
	Education								
Less than grade 12	0.39	0.27	0.81	0.85	0.19	0.15			
Grade 12 (Matric)	0.56	0.41	0.84	0.91	0.16	0.09			
Other tertiary	0.65	0.53	0.83	0.9	0.17	0.1			
Graduates	0.82	0.75	0.81	0.91	0.19	0.09			
Household Income									
Quintile 1	0.20	0.18	0.41	0.60	0.15	0.18			
Quintile 2	0.43	0.32	0.61	0.73	0.15	0.14			
Quintile 3	0.55	0.47	0.73	0.82	0.15	0.13			
Quintile 4	0.74	0.55	0.81	0.88	0.11	0.09			
Quintile 5	0.84	0.68	0.87	0.88	0.14	0.14			

Source: Authors' estimates using data from the QLFS 2019(Quarter 1) and NIDS 2017. Notes: Sample contains wage employed individuals aged 15-65. Population weights applied. We use income data from the 2017 national income dynamics survey (NIDS) to estimate employment status of individuals aged 15-65 by per capita income levels.

Figure A1: Duration of contract by written contract across wage quantiles.

Notes: Sample contains wage employed individuals age 15-65. Bracket weights for earnings given in brackets applied. Data source QLFS 2017 quarter 1

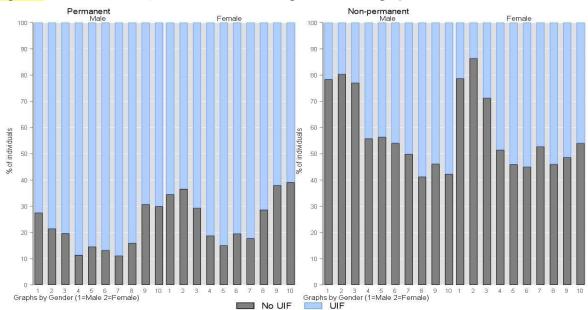
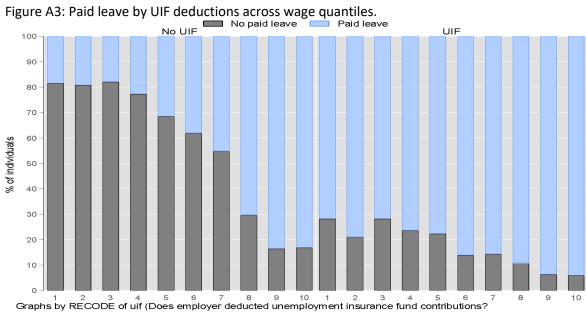


Figure A2: UIF deductions by duration of contract and gender across wage quantiles

Source: Authors' estimates using data from the QLFS 2017(Quarter 1). Notes: Sample contains wage employed individuals aged 15-65. Population weights applied.



Authors' estimates using data from the QLFS 2017(Quarter 1). Notes: Sample contains wage employed individuals age 15-65. Bracket weights for earnings given in brackets applied. Data