

"I would rather have a decent job": Barriers preventing street waste pickers from improving their socioeconomic conditions*

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Abstract

As a result of the high levels of unemployment in South Africa many unskilled people are forced to resort to a variety of income-generating activities in the informal economy. The activity of collecting and selling recyclables presents virtually no barriers to entry, making it a viable option. Very little research focusing on street waste pickers is done, and when done it mostly takes the form of case studies. This article reports the results of the first countrywide research into the barriers that prevent street waste pickers from improving their socioeconomic circumstances.

The study used a mixed method approach. Structured interviews were conducted between April 2011 and June 2012 with 914 street waste pickers and 69 buy-back centres in 13 major cities across all nine provinces in South Africa. Low levels of schooling, limited language proficiency, uncertain and low levels of income as well as limited access to basic social needs make it difficult for waste pickers to move upwards in the hierarchy of the informal economy.

The unique set of socioeconomic circumstances under which street waste pickers operate in the various cities and towns in South Africa makes the design for any possible policy interventions a complex one. Policy makers will have to take note of the interdependence of the barriers identified in this research. Failing to do so may cause policies that are aimed at supporting street waste pickers to achieve the exact opposite and ironically deprive them of their livelihood.

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1 Introduction

A Colombian waste picker once said, “If we were any poorer, we’d be dead” (Ballve, 2008:1). Along with one per cent of the world’s urban population, collecting and selling recyclable waste has become alternative informal employment for at least 37 000 people in South Africa (Langenhoven & Dyssel, 2007). Most of these people form part of the semi-skilled or unskilled portion of the labour force that are unable to find employment in South Africa’s formal economy in the face of persistently high rates of unemployment. Their only alternative is to explore the possibilities of self-employment in the informal economy. The unemployed resort to different strategies to survive and informal economic activities, such as waste picking, is one of these strategies (Theron, 2010:1).

The terminology used to refer to people who collect and sell recyclable waste reflects and forms attitudes and perceptions towards these people (Samson, 2010). They are called waste pickers, scavengers, waste recyclers, garbage pickers or, on a more positive note, waste salvagers and reclaimers (Chvatal, 2010; Samson, 2010). We prefer the most commonly used term ‘waste pickers’ as it describes exactly the person’s actions. Most waste pickers in the informal economy earn a very low income for their work and effort and their socioeconomic conditions and working conditions remain calamitous. Many also face chronic poverty despite their attempts to generate a livelihood in the informal economy (Masocha, 2006:839).

Attempts to earn a living in the informal economy are heterogeneous and the informal economy can be divided into upper-tier and lower-tier activities. Maloney (2004:1159) refers to the upper and lower-tier activities as “voluntary entry” and “involuntary entry” into the informal economy respectively. The upper-tier activities attract people who enter the informal economy voluntarily with the expectation that their earnings will be higher in the informal economy than in the formal economy (Fields, 1990:66; Günther & Launov, 2012:89).

Entry into the lower-tier activities is involuntary and is only done by those who cannot find work in the formal labour market and do not meet the capital and skills requirements for the activities of the upper-tier self-employment informal economy (Günther & Launov, 2012:89).

The lower-tier activities are seen as the disadvantaged segment of the informal economy. Activities at this level involves the poor and include single street traders, micro enterprises and subsistence farmers (Chen, 2012:8; Djankov, Lieberman, Mukherjee, & Nenova, 2002:4; Launov & Günther, 2006:11; Viljoen, 2014). No aspirant-jobseeker would like to enter these activities as they do not generate sufficient income to reduce poverty (ESCAP, 2006:15; Fields, 1990:68; Gërkhani, 2004:268).

Barriers that push many of the unemployed into these lower-tier activities include relatively high start-up capital, labour relations issues and the lack of basic financial literacy skills. These barriers also prevent many from moving from the lower-tier to the higher-tier informal economy activities (Fields, 1990:66; Günther & Launov, 2012:89; Wills, 2009:2). These entry barriers also play a role in keeping the informal economy in South Africa relatively small in comparison

with other developing countries (Heintz & Posel, 2008:27).

Previous research on waste pickers in South Africa has focused mainly on the socioeconomic position of waste pickers on dump sites (Chvatal, 2010; Samson, 2010; Theron, 2010). Samson (2010) found 19 studies conducted in South Africa on this subject, only five of which were on the street waste pickers in different cities. Research on the street waste pickers in South Africa is therefore limited and mostly small scale in nature (Langenhoven & Dyssel, 2007; McLean, 2000). Research focusing on the various barriers experienced by street waste pickers is therefore limited at best. We attempted to fill this particular gap in the literature

The aim of this research is to explore the nature of the barriers that prevent street waste pickers in South Africa from improving their socioeconomic conditions.

We identified human capital constraints, labour market characteristics, limited earning potential and social aspects as possible barriers. The education levels of street waste pickers, language proficiency as well as their previous full-time job experience were examined to explore the possible human capital and labour market barriers. These are all aspects that influence the street waste pickers' likelihood to find employment in the higher-tier of the informal economy or the formal labour market. The income earned by street waste pickers was also analysed to determine whether it provides them with an opportunity to improve their socioeconomic conditions. The social background and conditions of street waste pickers were investigated to observe the extent to which they serve as social barriers preventing them from integrating and being part of the larger community in which they live.

The analysis presented in this article is based on data collected from a sample of 914 street waste pickers in South Africa, using a mixed method research approach. The results of the research follow the discussion of the literature and research methodology presented in the next sections.

2 Literature review

The concept of the informal economy gained recognition in the literature with the seminal paper of Hart (1973). Various theoretical approaches have been used to study the informal economy since then. The Dualist Theory postulates that the informal economy can absorb the growing number of people who cannot find economic opportunities in the more productive and remunerative formal economy (Heintz & Jardine, 1998:32). The informal economy features unregistered or unofficial small-scale or even subsistence businesses, temporary employment and self-employed persons (Becker, 2004:13; Hart, 1973:68). Table 1 gives an overview of the characteristics of the subsistence and unofficial enterprises derived from the literature.

The subsistence enterprises or activities in the informal economy are also referred to as lower-tier informal economy activities (Fields, 1990:69). Activities in the lower tier are often characterised by low productivity income earning op-

portunities which yield low wages and irregular working hours (Becker, 2004:13). There is agreement in the literature that income in the informal economy tends to decline as one moves closer to the subsistence or lower-tier activities (Wills, 2009:1).

Lower-tier activities are often the ones with few barriers or even unrestricted entry (Fields, 1990:69). Waste picking also falls in this category. Picking waste is labour intensive and requires little more than unskilled labour. Waste picking as a subsistence activity requires no capital or start-up costs, no education or skills and the waste picker has a guaranteed buyer for the waste picked. The only requirement for a waste picker is the physical ability to pick waste and to have access to waste and buy-back centres (BBCs) (Viljoen, Schenck & Blaauw, 2012:21; Viljoen, 2014).

The low entry requirements make waste picking a feasible income-generating opportunity for the very poor and economically disadvantaged to earn cash income (Masocha, 2006:843). Street waste picking is one of the means of subsistence for the poor who have no other income-generating options available to them (Carrasco, 2009:17; Ullah, 2008:10). Waste picking serves as a survivalist strategy, safety net and temporary substitute for social protection (Losby et al., 2002:9). As a source of raw materials, these activities are also at the bottom end of the recycling industry's hierarchy (Ullah, 2008:2). The hierarchy of the role players in the recycling industry is illustrated in Table 2.

The level on which the informal recycling activities occur has an influence on the income earned, working conditions and social status of the participants. People active at the lower end of the hierarchy are less organised, lack support networks and add less value to the waste they collect. These influences increase their vulnerability to exploitation which is reflected in the low incomes they earn (Wilson et al., 2006:801). Despite their contribution to the recycling of waste products, which benefits the community at large, the social and economic circumstances of street waste pickers keep them on the margins of poverty.

According to the Sustainable Livelihood Approach, any person needs the capabilities to reap the benefits from economic opportunities to reduce their poverty and to provide them with economic security and social well-being (Krantz, 2001:10-11). These capabilities do not only refer to the ability to earn an income, but also the capacity to consume and to earn assets. Authors such as Adato and Meinzen-Dick (2002:6) and Krantz (2001:10-11) categorised the main categories of assets or capital as human, financial, natural and social capital as well as access to information. A lack of capabilities will constrain the poor from seizing any opportunities that may lift them out of poverty.

Low levels of education, deficient language proficiency and little previous experience in the formal economy limit street waste pickers' labour market mobility. As a result, it is difficult for them to move away from the marginalised and lower-tier activities of the informal economy to higher tier informal or formal labour markets (Viljoen, 2014). The existence of social barriers may prevent street waste pickers from acquiring social capital that will enable them to become part of the community, integrating them into society and making them part of the larger group. It can also deprive them of the ability to build the

trust and relationships needed to function efficiently (Adato & Meinzen-Dick, 2002:6; Krantz, 2001:10-11).

To improve their position, they need to move upwards in the hierarchy (Wilson et al., 2006:800) within the recycling industry, to other higher-tier informal economy activities or to the formal economy. A synthesis of the available literature suggests that in low-tier activities such as waste picking the informal economy offers its participants little opportunity to invest in human capital in order to increase their skills level. The implication is that once in the informal economy, their chances of moving up the ladder are constantly diminishing (Suharto, 2002:116).

The literature on street waste pickers in South Africa does not focus on the barriers that prevent them to improve their socioeconomic conditions. This article reports on research conducted to fill this gap. Survey research among the waste pickers themselves is the only feasible option to achieve the research objective. The following sections describe the research methodology and present the results and analysis.

3 Survey of street waste pickers in South Africa

3.1 Research type and strategy

Street waste pickers are regarded as an “unknown population” and a “hard-to-reach” research population in terms of their numbers and the difficulty of finding them due to the nature of their work (Viljoen, 2014). These characteristics, coupled with the flexibility needed to accommodate the holistic nature of the research objectives, provided the rationale for using a mixed method approach for this research. The mixed method approach was used to mix quantitative and qualitative data in the collection and analysis stages in a single study (Creswell & Plano-Clark, 2011:5). The results of the qualitative questions support the quantitative data and reflect the voice of the street waste pickers.

Primary data were collected in two phases using a survey design in each phase. In the first phase, quantitative and qualitative data were collected concurrently from BBCs. The rationale for including the BBCs in the research was to get a more complete understanding of the street waste pickers, their activities in the recycling industry, and factors that affect their socioeconomic conditions. The best places to find the street waste pickers were at the BBCs where the street waste pickers sell the waste they have collected (Schenck & Blaauw, 2011:419). Thus, data on the best place and best time to find the street waste pickers were also collected from the BBCs. The data and information obtained from this dataset informed the procedures that were to be followed in collecting data from the street waste pickers. In the second phase, quantitative and qualitative data were collected concurrently from the street waste pickers.

The quantitative and qualitative data sets obtained in both phases of the study were analysed separately and integrated in the reporting and interpretation stage. The integration of these two datasets, coupled with the integration

of the data and information obtained from the literature review and theoretical overview in the reporting and interpretation stage, enhanced the reliability of this study.

3.2 Survey instrument

A face-to-face survey approach was used to collect data and information on the socioeconomic conditions of the street waste pickers. Face-to-face surveys can be used effectively when members of the research population have limited literacy levels, such as is the case with street waste pickers (Babbie & Mouton, 2011:249).

The survey instrument used by Schenck and Blaauw (2011) formed the foundation for the design of the structured qualitative and quantitative questionnaire to be used for the collection of the data. Advice and input from Melanie Samson, an expert on research among women in the informal economy and on waste pickers in South Africa, as well as the input and advice of a statistician were incorporated in the final version. The revised questionnaire was pilot tested by the research team during their visits to the BBCs in the reconnaissance phase.

Due to the lack of research on BBCs, a completely new questionnaire had to be designed to collect data from them. A thorough review of the existing literature on waste pickers and the limited information available on BBCs served as a starting point and informed the type of questions to be included in the questionnaire. To help shape the final questionnaires and to ensure the validity and adequacy of the research instruments, a pilot version of the two questionnaires were administered among street waste pickers as well as amongst two BBC-owners.

3.3 Sampling method

Street waste picking is not officially recognised as an occupation and only estimates on the total number of street waste pickers in South Africa are available. Most street waste pickers also do not have a fixed address and sleep on the street and in the bushes. During the day they move around the cities to collect waste, depending on the availability thereof.

The recycling industry as a whole is largely under-researched and no central or reliable database on the location of BBCs could be located. The research team visited all the envisaged cities in a reconnaissance effort to locate and visit all the BBCs. The BBCs were also not able to provide reliable estimations on the number of street waste pickers who visit them, due to the nature of the street waste pickers' visits to the BBCs. The street waste pickers visit the BBCs at different times of the day and on different days of the week. In some cases they visit the same BBC more than once on a particular day, or they visit more than one BBC on the same day.

Because no sampling frame is available for this research population, a non-probability sampling technique was used as suggested by Bhattacharjee (2012:70)

to collect data from both the BBCs and the street waste pickers. The non-probability sampling technique used was snowball sampling which is a respondent-assisted sampling method. All ethical considerations were strictly adhered to and ethical clearance was obtained before the research commenced.

3.4 Data collection

The results of the study are based on data collected from 914 street waste pickers and 69 BBCs in 13 cities across all provinces in South Africa. The cities included all the provincial capitals as well as other important economic centres in each province. The data were collected between 19 April 2011 and 28 June 2012. The next section provides insight into the human capital, labour market, economic and social barriers that make it difficult for street waste pickers to improve their socioeconomic conditions.

4 Analysis and interpretation of results

4.1 Human capital and labour market barriers

High levels of unemployment as well as structural changes in the form of lower demand for semi-skilled and unskilled workers force many people in South Africa into the informal economy (Carrasco, 2009:17). Institutional failure is, however, not the only reason why street waste pickers are unable to move upwards in the hierarchy of informal economy activities. Certain inherent characteristics also contribute to their inability to find employment in the formal or informal economy. These individualities relate to the street waste pickers' level of human capital development which includes their highest education levels, language proficiency and previous full-time work experience.

There are few job prospects for uneducated people (Fryer & Hepburn, 2010:6). An analysis of their educational levels reveals that only three street waste pickers were on a level higher than Grade 12. An overwhelming majority (92.9%) of the street waste pickers had not completed their formal schooling. Almost all the respondents therefore had only completed their secondary schooling or had more limited schooling or no schooling at all (see Figure 1).

The age groups 35-44 years and 45-54 years contained the largest proportions of street waste pickers without any formal schooling, namely 19% and 17% respectively (see Table 3).

The youth street waste pickers between 14 and 34 years of age (the broad definition) had the highest school attainment levels. They also constituted the age groups within which the highest percentage of street waste pickers had completed their secondary schooling. The high percentage of young people involved in waste picking is a reflection of the employment crisis which takes a heavy toll on the youth in South Africa in general. Having completed secondary schooling is indeed no meal ticket, but merely a hunting licence, with no guarantee for

finding a job. Low education levels make it even more difficult for the young street waste pickers to compete for jobs.

The reasons why so many of the street waste pickers left school early provide a qualitative perspective on their inability to acquire higher levels of human capital. The respondents were asked in an open-ended qualitative question about the reasons why they had not been able to complete their schooling. Seven themes could be identified. The majority (68%) of the street waste pickers left school early due to financial difficulties as indicated in Table 4.

Of concern is the fact that 17.9% of those who left school because of poverty or financial problems have lost one or both parents and had no-one to care for them. Poverty has a detrimental effect on the capability of an individual to obtain the benefits from schooling (Fryer & Hepburn, 2010:6).

Reasons other than those of a financial nature that made young people leave school early included family-related issues, problems at school, behavioural issues, health and age. Family-related issues are the second most common reason for leaving school early (see Table 5).

When people are excluded from school, regardless the reason, they are deprived of the literacy and numeracy skills attained as a result of formal schooling (Berntson, 2008:26).

Without the basic skills mentioned above it becomes difficult to find employment, whether in the formal or informal labour market, and any inability to properly communicate exacerbates the situation. The self-perceived language proficiency of the respondents shows that the majority (53.7%) of the street waste pickers could not understand English well and 56% could not speak English well. The same trend was observed with Afrikaans where 51.8% of the street waste pickers were not able to understand, and 53.7% could not speak Afrikaans well (see Figure 2).

A comparison between language proficiency and age revealed that the majority of the street waste pickers who could speak and understand English and Afrikaans well were in the older age categories (between 35 and 54 years). Table 6 shows that the largest percentage of street waste pickers who could not speak and understand Afrikaans, English or both was in the youngest age categories, namely 14-24 years and 25-34 years.

The results could be an overestimation of street waste pickers who were proficient in English and Afrikaans because the language proficiency was not evaluated but the self-assessment merely reflected the street waste pickers' own perception of their level of proficiency. Notwithstanding this, it was clear that a lack of language proficiency can constitute a barrier for a third of the street waste pickers in their possible attempts to find alternative employment.

The level of human capital development in terms of school attainment levels, work experience, skills and language proficiency are barriers that make it difficult for the street waste pickers to find formal employment or more highly paid informal jobs. Consequently, their ability to improve their socioeconomic conditions diminishes. According to standard labour market theory, education and training are two important factors of human capital development, which can improve a person's earnings (Berntson, 2008:26). High levels of human

capital also enable people to initiate and use other productive assets (Adato & Meinzen-Dick, 2002:6; Krantz, 2001:10-11).

The lack of human capital development and the effect thereof on the employability of the street waste pickers are reflected in the analysis of their previous full-time work experience. Just more than half (52.4%) of the street waste pickers previously had a full-time job with benefits¹. These street waste pickers also tend to be those with relative better levels of education². Almost half of the respondents therefore lacked full-time work experience which could also make them more vulnerable in the competition to find and get a full-time job. The majority of the street waste pickers, who previously had full-time jobs, also did not have them for long periods of time, as indicated in Table 7.

The street waste pickers who held their previous full-time work for longer periods were the older street waste pickers who only picked waste to supplement their pension or old age grants. The reasons they gave for leaving their last full-time work are presented in Figure 3 and relates to disciplinary actions, quitting of jobs, lay-offs and other reasons.

The responses to a qualitative question on whether the street waste pickers were looking for and would like to have a full-time job revealed that 85.7% of the street waste pickers were indeed looking for another job. More than a third (345) of the street waste pickers indicated that they would take any job they could get. To them street waste picking was just a survival activity. Most street waste pickers would have preferred to have full-time employment, as indicated by the excerpts that follow:

“I would rather have a decent job.”

“I want to find a job.”

“Not a good way of making a living.”

“I just want a good job.”

The responses of the street waste pickers also implied that street waste picking does not yield high levels of income. Low income can possibly constitute an economic barrier preventing street waste pickers from improving their socioeconomic conditions.

4.2 Income earning opportunities as economic barrier

The analysis of the income of street waste pickers, show that their income was either earned on the day on which they had collected their waste, or on a weekly basis. Most of the street waste pickers (751 or 82%) earned their income for a day’s waste collected. Half of these street waste pickers earned an income of R50 or below on a usual day. Another 25% earned an income of between R51 and R85 on a usual day. The average income on a usual day was only R67.26, showing that the majority of street waste pickers earned low incomes. The

¹See Appendix 1 for a detailed exposition of the nature and types of jobs held by street waste pickers on a full-time basis.

²See Appendix 2 for the levels of education of street waste pickers who had a full-time job previously.

average income received for a usual week was R505.06 with half of the street waste pickers getting only R300.

The global poverty measure of US\$2.50 per day for a high middle-income country such as South Africa, discounted at the purchasing power parity exchange rate in 2012 of R5.69 (IRS, 2013:1) amounted to R14.23 per person per day. The \$2.50 per day poverty line represents the income necessary for one person to survive and not for a whole household (McLean, 2000:20). On average, a street waste picker had to support three people (excluding themselves). Therefore, the nominal income necessary for four persons amounted to R56.90, which is more than the mean and median usual day income earned by the street waste pickers. The income needed to support four people for a week in 2012 amounted to R398.30, which is also higher than the usual week median income of R300. The majority of the street waste pickers therefore earned an income below the poverty line (see Figure 4).

The uncertainty about the street waste pickers' income is another aspect that makes it difficult for them to improve their socioeconomic conditions (Viljoen, 2014). The street waste pickers' income differs from day to day. On some days, they might earn high incomes and on other days they might earn low incomes, as reflected by the mean and median incomes received on a good and bad day or week shown in Figure 4. It seems as if the street waste pickers cannot be certain of the income they will be earning by collecting waste on any given day or in any particular week.

There were significant differences in the incomes earned on a usual, good and bad day and in a usual, good and bad week. Factors that influence the income are the type and value of the recyclable waste products available, the location (e.g. residential or business) where the waste is picked, the weather, the demand and supply of recyclable waste, the fluctuating prices received for recyclable waste products, the level of competition for recyclable waste products and the type of equipment used to carry the waste (Viljoen, 2014). Exogenous factors such as the behaviour of people in the other 'sectors' of the waste-producing and -removal 'system', industrial action and unforeseen periods of holidays also play a role in this regard.

The street waste pickers' low and uncertain income levels and their resultant inability to meet their basic needs was a real concern for them, as shown by their comments on this issue:

"The uncertainty of my income worries me."

"Sometimes you don't make enough to buy food."

Unsurprisingly, the expenditure patterns of street waste pickers showed that food was the major consumable item purchased. The second most bought products were cleaning materials and cigarettes, tobacco, snuff or other items for smoking. Fewer street waste pickers bought clothes, shoes, blankets, transport and sources of energy. Only 26.2% paid for the place where they slept and a mere 4.2% spent money on medical expenses. A large percentage (41.6%) of the street waste pickers also spent some of their money on alcoholic beverages such as beer, wine and spirits. Very few (4.7%) paid school/college fees and only 4.2% made contributions to a stokvel or burial society. The income earned

by the street waste pickers was not enough to enable them to participate fully in their community. This finding echoes Furedy's (1990:10) observation that street waste pickers are also inhibited by social barriers from translating their earnings into improved standards of living.

4.3 Social barriers

Indicators that contextualise the social conditions of street waste pickers are access to resources that meet their basic human needs (like the type of structure or shelter where they usually sleep), access to food and access to or the availability of other basic household services. A lack of means to fulfil these social needs inhibits the street waste pickers' capability to be productive.

Figure 5 illustrates the type of structure or shelter where the street waste pickers usually sleep.

The lack of proper housing was a serious problem among street waste pickers. The street waste pickers who slept on the street or in the veld or bush also lacked access to other basic household services such as drinking water, toilet facilities, cooking facilities and washing facilities. As one of the street waste pickers put it:

"My concern is a place to live and a place to bath . . ."

Table 8 illustrates the situation.

The street waste pickers expressed their gratitude for the food that they received. One of them expressed it as follows:

"I am thankful to all the people who bring food to us after hours."

The above findings confirm that street waste pickers are generally deprived from the social capital needed to become part of the community.

The reasons given by respondents for becoming street waste pickers also show that these people were indeed marginalised. The single most important reason given by 36.4% of the street waste pickers for becoming street waste pickers was that they had no other option. Another 14% also said that they were doing the job because they could not find work. For 19.4% the motive for becoming street waste pickers was to get some income and some indicated that they pick waste just to be able to buy food.

The human capital, labour market, and social barriers are interdependent and are collectively responsible for keeping street waste pickers in the lower levels of the informal economy with little hope of improving their socioeconomic conditions.

5 Conclusion

High levels of unemployment and structural changes in the South African economy are forcing scores of low-skilled and unskilled people into the lower tiers of the informal economy. Collecting and selling recyclable waste is one of the activities people resort to in an effort to earn an income in the informal economy. Existing research on the activities and lives of waste pickers mostly focuses on

the waste pickers working on municipal dump sites and generally takes the form of small-scale case studies. Research on the obstacles facing the street waste pickers is limited and the aim of the research reported in this article was to fill the gap by investigating the barriers standing in the way of the street waste pickers to improve their socioeconomic situation. The barriers in question relate to the street waste pickers' lack of human capital, labour market immobility, income earned and the acquiring of social capital. A mixed method research approach was used. A countrywide survey of 914 street waste pickers and 59 BBCs in all nine provinces of South Africa formed the foundation of the analysis.

Deprived social and economic backgrounds played a significant role in preventing the majority of the street waste pickers from completing their formal schooling. Their low levels of education, limited language proficiency and lack of formal work experience impacts negatively on their labour market mobility and ability to compete for jobs.

The street waste pickers face an economic barrier in the form of low and uncertain income earned. All the income variables analysed suggested that given the number of their dependants, most street waste pickers found themselves below the global poverty line appropriate for a high middle-income country like South Africa. Any form of planning for the future or attempts to improve their socioeconomic situation therefore becomes extremely difficult if not impossible. From a social perspective the prospects for improving their socioeconomic conditions are also limited. The lack of proper housing, the lack of access to basic services and in some instances the lack of food constitutes a social barrier that seems almost insurmountable. Most street waste pickers are caught in a poverty trap from which it is difficult to escape.

The human capital, labour market, economic and social barriers are therefore dualistic in nature as they do not only contribute to the street waste pickers' poor socio-economic conditions, but also keep them trapped in the lower tier of the informal economy. Interventions to address these barriers are needed to enable street waste pickers to improve their position.

Any policy interventions will therefore have to address, almost simultaneously, the poverty, human capital, economic, social and labour market barriers that make it inherently difficult for street waste pickers to improve their socioeconomic conditions. Interventions aimed at supporting street waste pickers should not deprive them of their livelihood, meagre as it is. A blanket-type strategy is bound to fail.

The only feasible approach to achieve this awareness is to conduct in-depth studies at a micro-level into the social and economic lives of street waste pickers. The research process was subject to the same limitations as experienced in all cross-sectional studies. Issues such as endogeneity make inferences in terms of causality difficult. However, the research reported on in this article lays a suitable foundation for focused research initiatives in all towns and cities in South Africa. Waste pickers in South Africa share the same tribulations as those in Columbia. Pushing their trolleys, collecting their waste and selling it is the only alternative for many of South Africa's citizens. Indeed, they cannot afford to become any poorer.

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